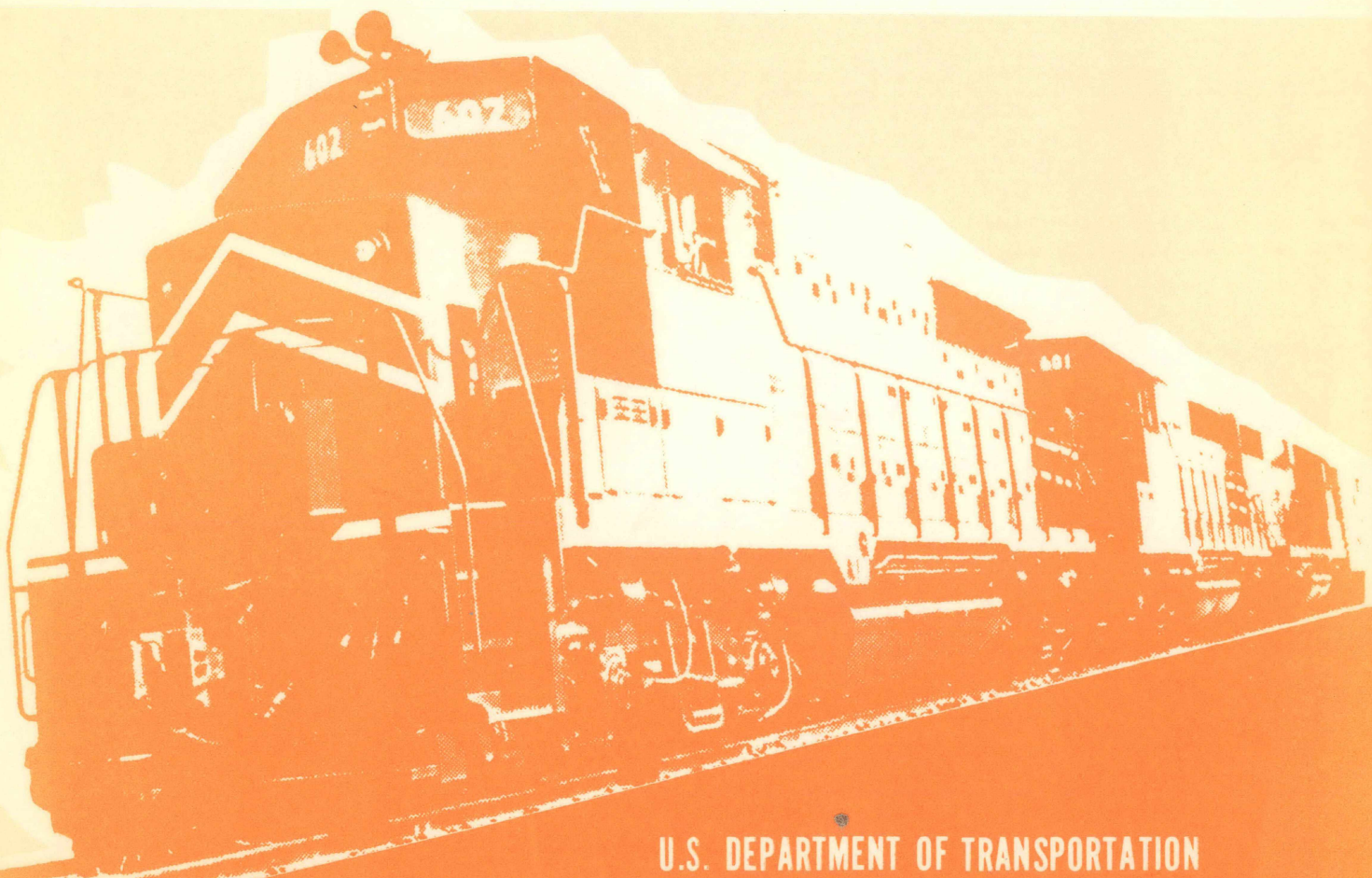


ACCIDENT/INCIDENT BULLETIN

No. 146

Calendar Year 1977



U.S. DEPARTMENT OF TRANSPORTATION

FEDERAL RAILROAD ADMINISTRATION
OFFICE OF SAFETY



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- ☐ b. The Bulletin's data tables are poorly designed and difficult to read and interpret.
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FEDERAL RAILROAD ADMINISTRATION

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INTRODUCTION

In accordance with 49 CFR 225, all railroads are required to file monthly accident/incident reports with Office of Safety, Federal Railroad Administration (FRA). For the purposes of these requirements a "railroad" is any system of surface transportation of persons and property over rails. It includes line-haul freight and passenger railroads, switching and terminal railroads, and passenger-carrying railroads including, but not limited to, rapid transit, commuter, scenic, street, subway, elevated, cable and cog railways.

The purpose of reporting to the FRA the occupational illness of employees, damage to railroad equipment and structures, and injury to persons arising from the operation of a railroad, is to carry out the intent of Congress as expressed in the Federal Railroad Safety Act of 1970 (PL-91-458) and the Accident Reports Act, as amended (45 USC-38-43), namely the disclosure of hazards arising in the provision of carrier transportation by rail.

A direct comparison of 1975 and later years with previous data is not feasible due to major revisions in reporting requirements effective January 1, 1975. These major changes are in the following categories: Railroad Equipment Accidents/Incidents, Fatalities, Occupational Injuries, and Occupational Illnesses. Due to the scope of these changes it is felt that data collected during 1975 may be somewhat understated. (Please refer to the appendix for a discussion of these revisions.)

The reporting guide used to complete accident/incident reports is reviewed every two years to locate areas where improvements can be made. In 1976 it was determined that in many instances, the cause and occurrence codes being used were not specific enough to accurately describe the accident/incident which had occurred. After a thorough examination new codes were added and others were redefined prior to the release of the 1977 reporting instructions. Totals for major code groupings have not been significantly affected by these changes. However, care should be taken when making comparisons of individual codes used in 1977 with those used in 1975 and 1976.

Due to the fact that injuries are often sustained by more than one person in a single railroad accident/incident and because certain accidents/incidents are reportable even though they result in no personal casualty, the total number of accidents and casualties shown in accident tables may differ. When a table is concerned solely with occupational illnesses; it is so noted in the table heading. In those tables where injuries and illnesses are combined, it is under the heading of "Nonfatal Casualties". Also, in this publication, nonfatal illnesses are included in the injury data, unless otherwise noted.

Tables pertaining to Rail Rapid Transit carriers are appropriately headed and separate from those concerning common carriers. In those instances where all categories of railroads are combined in a single table, it is so noted in the table and column headings.

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TABLE 1 10 YEAR OPERATIONAL PROFILE
CLASS I AND CLASS II RAILROADS, 1968 - 1977

Year	Man Hours a (000,000)	Motor Train Miles b (000)	Yard Switching Miles c (000)	Locomotive Miles d (000)	Total Train Miles (b+c+d) (000)
1968	1,247	27,024	293,057	556,408	876,489
1969	1,221	29,498	294,301	540,282	864,081
1970	1,195	29,825	286,825	521,920	838,674
1971	1,124	28,179	268,449	487,216	783,844
1972	1,087	28,313	259,492	493,603	781,408
1973	1,090	28,768	263,782	538,797	831,347
1947	1,099	31,261	250,261	551,575	833,261
1975	1,028	35,104	220,175	499,754	755,033
1976	1,046	65,989	217,363	491,411	774,764
1977	1,053	32,419	218,544	499,079	750,042

TABLE 2 NUMBER OF RAILROAD ACCIDENTS OF ALL TYPES
CLASS I AND CLASS II RAILROADS, 1968 - 1974

Year	Train	Train Service	Non Train	Total
1968	8,028	15,934	7,765	31,727
1969	8,543	15,388	7,170	31,101
1970	8,095	14,419	6,812	29,326
1971	7,304	12,562	6,068	25,934
1972	7,532	11,825	5,632	24,989
1973	9,698	12,384	5,538	27,620
1974	10,694	13,185	7,017	30,896

TABLE 2a NUMBER OF RAILROAD ACCIDENTS/INCIDENTS
OF ALL TYPES
CLASS I AND CLASS II RAILROADS, 1975 - 1977 *

Year	Train Accidents	Train Incidents	Nontrain Incidents	Total
1975	8,041	11,777	41,058	60,876
**1976	10,248	12,303	50,532	73,083
1977	10,362	14,611	51,601	76,574

* Refer to introduction and appendix for explanation of changes in accident categories.

** Due to duplicate reporting, the number of train and nontrain incidents for 1976 has been revised.

TABLE 3 TRAIN ACCIDENTS BY CLASS
SHOWING DAMAGE TRENDS
1968 - 1977*

Acc/Year	Total Accidents	Total Damage (\$)	Average Damage (\$)	Damage/Mill Train Mi (\$)	Acc/Mill Train Mi
COLLISIONS					
1968	1,727	10,993,856	6,366	12,543	1.97
1969	1,810	22,139,356	12,232	25,622	2.09
1970	1,756	16,838,676	9,589	20,078	2.09
1971	1,529	15,780,914	10,321	20,133	1.95
1972	1,348	12,928,501	9,591	16,545	1.73
1973	1,657	21,855,270	13,190	26,289	1.99
1974	1,551	27,761,642	17,899	33,317	1.86
1975	1,002	17,291,171	17,257	22,901	1.33
1976	1,370	24,749,012	18,065	31,944	1.77
1977	1,363	34,101,836	25,020	45,467	1.82
DERAILMENTS					
1968	5,487	99,472,188	18,129	113,489	6.26
1969	5,960	103,782,379	17,413	120,107	6.90
1970	5,602	101,228,437	18,070	120,701	6.68
1971	5,131	90,531,109	17,644	115,496	6.55
1972	5,509	91,282,824	16,570	116,818	7.05
1973	7,389	126,112,942	17,068	151,697	8.89
1974	8,513	154,548,384	18,154	185,474	10.22
1975	6,328	147,755,647	23,350	195,694	8.38
1976	7,934	184,273,761	23,226	237,845	10.24
1977	8,073	223,123,541	27,638	297,481	10.76
OTHER					
1968	814	3,878,268	4,764	4,425	0.93
1969	773	3,626,169	4,691	4,197	0.89
1970	737	3,558,165	4,828	4,243	0.88
1971	644	3,472,022	5,391	4,429	0.82
1972	675	3,309,015	4,902	4,235	0.86
1973	652	7,334,935	11,250	8,823	0.78
1974	630	5,390,321	8,556	6,469	0.76
1975	711	12,351,384	17,372	16,359	0.94
1976	944	17,967,924	19,034	23,191	1.22
1977	926	22,224,959	24,001	29,632	1.23
ALL ACCIDENTS					
1968	8,028	114,344,312	14,243	130,457	9.16
1969	8,543	129,547,904	15,164	149,925	9.89
1970	8,095	121,625,278	15,025	145,021	9.65
1971	7,304	109,784,045	15,031	140,059	9.32
1972	7,532	107,520,340	14,275	137,598	9.64
1973	9,698	155,303,147	16,014	186,809	11.67
1974	10,694	187,700,347	17,552	225,260	12.83
1975	8,041	177,398,202	22,062	234,954	10.65
1976	10,248	226,990,697	22,150	292,980	13.23
1977	10,362	279,450,336	26,969	372,579	13.82

* Prior to 1974 the train accident reporting threshold was \$750; for 1975-76, \$1750; and for 1977, \$2300.

TABLE 4 TRAIN ACCIDENTS BY CONTRIBUTING CAUSE
SHOWING DAMAGE TRENDS, CLASS I AND CLASS II RAILROADS
1968 - 1977*

Contributing Cause and Year	Total Accidents	Total Damage (\$)	Average Damage (\$)	Damage/Mill Train Miles (\$)	Acc/Mill Train Miles
HUMAN FACTORS					
1968	2,174	18,352,058	6,663	20,938	2.48
1969	2,339	23,056,564	9,857	26,683	2.71
1970	2,191	19,032,384	8,687	22,693	2.61
1971	1,912	15,732,800	8,228	20,071	2.44
1972	1,853	15,324,095	8,270	19,611	2.37
1973	2,282	27,253,258	11,943	32,782	2.74
1974	2,238	29,060,242	12,985	34,875	2.69
1975	1,847	29,971,497	16,211	39,696	2.45
1976	2,360	31,939,411	13,534	41,225	3.05
1977	2,559	65,679,391	25,666	87,568	3.41
EQUIPMENT FAILURES					
1968	2,042	38,891,631	19,046	44,372	2.33
1969	2,142	48,297,232	22,548	55,894	2.48
1970	1,890	38,354,491	20,293	45,732	2.25
1971	1,630	34,998,177	21,471	44,649	2.08
1972	1,577	31,188,889	19,777	39,914	2.02
1973	1,992	38,319,889	19,237	46,094	2.40
1974	2,175	49,936,473	22,959	59,929	2.61
1975	1,906	49,721,935	26,087	65,854	2.52
1976	2,174	68,572,507	31,542	88,508	2.81
1977	2,064	70,662,940	34,236	94,212	2.75
DEFECTS IN WAY OR STRUCTURES					
1968	2,128	25,288,516	13,714	28,255	2.06
1969	2,483	34,740,363	13,991	40,205	2.87
1970	2,470	38,818,645	15,716	46,286	2.95
1971	2,276	34,332,685	15,085	43,800	2.90
1972	2,544	37,908,031	14,901	48,512	3.23
1973	3,556	51,548,006	14,496	62,005	4.28
1974	4,264	70,218,582	16,468	84,270	5.12
1975	3,176	69,519,019	21,889	92,074	4.21
1976	4,260	85,537,356	20,079	110,404	5.50
1977	4,337	96,377,004	22,222	128,495	5.78
ALL OTHER CAUSES					
1968	1,684	24,874,058	14,771	28,379	1.92
1969	1,579	23,453,745	14,854	27,143	1.83
1970	1,544	25,419,758	16,464	30,309	1.84
1971	1,486	24,720,383	16,636	31,537	1.90
1972	1,558	23,099,325	14,826	29,561	1.99
1973	1,868	38,181,994	20,440	45,928	2.25
1974	2,017	38,485,050	19,080	46,186	2.42
1975	1,112	28,185,751	25,347	37,330	1.47
1976	1,454	40,941,423	28,158	52,844	1.88
1977	1,402	46,731,001	33,332	62,304	1.87
TOTAL ALL TRAIN ACCIDENTS					
1968	8,028	114,344,312	14,243	130,457	9.16
1969	8,543	129,547,904	15,164	149,925	9.89
1970	8,095	121,625,278	15,025	145,021	9.65
1971	7,304	109,784,045	15,031	140,059	9.32
1972	7,532	107,520,340	14,275	137,598	9.64
1973	9,698	155,303,147	16,014	186,809	11.67
1974	10,694	187,700,347	17,552	225,260	12.83
1975	8,041	177,398,202	22,062	234,954	10.65
1976	10,248	226,990,697	22,150	292,980	13.23
1977	10,362	279,450,336	26,969	372,579	13.82

* Prior to 1974 the train accident reporting threshold was \$750; for 1975-76, \$1750; and for 1977, \$2300.

TABLE 5 CASUALTIES BY TYPE OF ACCIDENT
CLASS I AND CLASS II RAILROADS
1968 - 1974

Class of Acc/Inc By Year	Total Killed	Total Injured	Total Casualties	Total Accident	Casualties per Million Train Miles
Train Accident					
1968	142	1,293	1,435	8,028	1.6
1969	203	1,173	1,376	8,543	1.5
1970	210	627	837	8,095	0.9
1971	171	694	865	7,304	1.1
1972	171	777	948	7,532	1.2
1973	149	758	907	9,698	1.0
1974	139	911	1,050	10,694	1.2
Train Service Accidents					
1968	2,141	15,500	17,641	15,934	20.1
1969	2,011	14,986	16,997	15,388	19.7
1970	1,936	13,878	15,814	14,419	18.9
1971	1,792	12,171	13,963	12,562	17.8
1972	1,704	11,507	13,211	11,825	16.9
1973	1,704	11,946	13,650	12,384	16.4
1974	1,692	12,878	14,570	13,185	17.5
Non Train Accidents					
1968	76	7,815	7,891	7,765	9.0
1969	85	7,197	7,282	7,170	8.4
1970	79	6,822	6,901	6,812	8.2
1971	47	6,107	6,154	6,068	7.9
1972	70	5,646	5,716	5,632	7.3
1973	63	5,541	5,604	5,538	6.7
1974	77	7,029	7,106	7,017	8.5
All Accidents					
1968	2,359	24,608	26,967	31,727	30.7
1969	2,299	23,356	25,655	31,101	29.6
1970	2,225	21,327	23,552	29,326	28.0
1971	2,010	18,972	20,982	25,934	26.8
1972	1,945	17,930	19,875	24,989	25.4
1973	1,916	18,245	20,161	27,620	24.1
1974	1,908	20,818	22,726	30,896	27.2

TABLE 5a CASUALTIES BY TYPE OF ACCIDENT
CLASS I AND CLASS II RAILROADS
1975 -1977*

Class of Acc/Inc By Year	Total Fatal	Total non Fatal	Total Casualties	Total Accidents	Casualties per Million Train Miles
Train Accidents					
1975	82	1,220	1,302	8,041	1.92
**1976	152	1,279	1,431	10,248	1.85
1977	108	985	1,093	10,362	1.46
Train Incidents					
1975	1,241	11,779	13,020	11,777	17.24
**1976	1,259	12,648	13,907	12,368	17.94
1977	1,340	14,876	16,216	14,611	21.62
Non Train Accidents					
1975	237	41,307	41,544	41,058	55.02
**1976	219	51,404	51,623	50,535	66.63
1977	82	52,006	52,088	51,601	69.45
All Accidents					
1975	1,560	54,306	55,866	60,878	73.99
1976	1,630	65,331	66,961	73,151	86.43
1977	1,530	67,867	69,397	76,574	92.52

*Refer to introduction and appendix for explanation of changes in accident categories.
** Due to duplicate reporting, casualty figures for 1976 have been revised.

TABLE 6 CASUALTIES BY CLASS OF PERSON, CLASS I AND CLASS II RAILROADS
1968 - 1977*

Year	Employees on Duty		Employees Not on Duty		Passengers	
	Killed	Injured	Killed	Injured	Killed	Injured
1968	146	17,600	4	516	11	1,329
1969	178	16,758	12	497	6	862
1970	155	15,743	17	542	8	489
1971	118	13,644	5	547	16	536
1972	127	12,456	6	517	47	680
1973	158	13,098	3	453	6	503
1974	140	15,620	4	382	7	574
1975	110	47,318	3	537	8	1,307
**1976	100	57,889	9	588	5	998
1977	114	61,028	2	615	4	503

Year	Non Trespassers		Trespassers		Total	
	Killed	Injured	Killed	Injured	Killed	Injured
1968	1,570	4,500	628	663	2,359	24,608
1969	1,476	4,565	627	674	2,299	23,356
1970	1,452	3,907	593	646	2,225	21,327
1979	1,320	3,638	551	607	2,010	18,972
1972	1,228	3,691	537	586	1,945	17,930
1973	1,171	3,577	578	614	1,916	18,245
1974	1,192	3,568	565	674	1,908	20,818
1975	915	4,441	524	703	1,560	54,306
**1976	1,059	5,090	457	766	1,630	65,331
1977	952	5,032	458	689	1,530	67,867

* Refer to Introduction and Appendix for explanation of major revisions to reporting requirements.

** Due to duplicate reporting, casualty figures for 1976 have been revised.

TABLE 101-A FATALITIES FOR CLASS I AND CLASS II RAILROADS
BY CLASS OF ACCIDENT, 1977

	Total Acci- dents	Fatal Acci- dents	Employees on duty....			Empl not on duty	Passen- gers	Non tres- passers	Tres- passers	Total Killed
			Trainmen	Other	Total					
TRAIN ACCIDENTS										
Collisions	1,362	3	4	---	4	---	---	---	---	4
Derailements	8,073	7	6	---	6	---	---	2	---	8
Grade crossing	323	22	7	2	9	---	---	75	6	90
Other train accidents	604	3	---	---	---	---	---	6	---	6
TOTAL.....	10,362	35	17	2	19	---	---	83	6	108
TRAIN INCIDENTS										
Coupling incidents	758	9	9	---	9	---	---	---	---	9
Operating locomotives	898	---	---	---	---	---	---	---	---	---
Operating rail motor car	316	---	---	---	---	---	---	---	---	---
Operating handbrakes	311	3	3	---	3	---	---	---	---	3
Operating switches	108	---	---	---	---	---	---	---	---	---
Striking fixed structures	287	6	4	1	5	---	---	---	1	6
Getting on or off trains	2,474	30	7	---	7	---	2	---	21	30
Highway grade accidents	3,789	712	2	1	3	---	---	793	55	851
Struck or run over	948	387	11	7	18	---	---	52	338	408
Flying or falling objects	1,593	---	---	---	---	---	---	---	---	---
Assaults	244	---	---	---	---	---	---	---	---	---
Miscellaneous	2,885	32	12	8	20	---	2	2	9	33
TOTAL.....	14,611	1,179	48	17	65	---	4	847	424	1,340
NONTRAIN INCIDENTS										
Coupling incidents	1,933	---	---	---	---	---	---	---	---	---
Operating switches	2,115	---	---	---	---	---	---	---	---	---
Getting on/off locos or cars	2,628	2	---	---	---	---	---	1	1	2
Servicing or maintenance of equip	13,659	3	---	3	3	---	---	---	---	3
Maintenance of way and structures	18,161	16	---	13	13	---	---	3	---	16
Involving freight, baggage, etc.	273	---	---	---	---	---	---	---	---	---
Involving windows, doors, etc.	1,165	3	---	2	2	---	---	1	---	3
Involving passenger car doors	31	---	---	---	---	---	---	---	---	---
Stumbling, falling not on car/loco	4,750	9	1	1	2	---	---	3	4	9
Flying/falling objs, burns, etc.	1,949	9	---	---	---	1	---	3	5	9
Assaults to persons	277	2	---	1	1	1	---	---	---	2
Miscellaneous	4,660	36	2	7	9	---	---	11	18	38
TOTAL.....	51,601	80	3	27	30	2	---	22	26	82
GRAND TOTAL	76,574	1,294	68	46	114	2	4	952	458	1,530

TABLE 101-B NON-FATAL CASUALTIES FOR CLASS I AND CLASS II RAILROADS
BY CLASS OF ACCIDENT, 1977

	Total acci- dents	Nonfatal acci- dents	Employees on duty... Trainmen Other Total			Empl not on duty	Passen- gers	Non Tres- passers	Tres- passers	Total Non-Fatal Casualties
TRAIN ACCIDENTS										
Collisions	1,362	1,359	204	19	223	---	5	4	---	232
Derailements	8,073	8,066	288	34	322	7	44	23	3	399
Grade crossing	323	301	122	28	150	---	23	145	17	335
Other train accidents	604	601	6	---	6	---	4	9	---	19
TOTAL.....	10,362	10,327	620	81	701	7	76	181	20	985
TRAIN INCIDENTS										
Coupling accidents	758	749	730	20	750	1	---	5	---	756
Operating locomotives	898	898	879	36	915	---	---	2	1	918
Operating rail motor car	316	316	34	313	347	1	---	4	---	352
Operating handbrakes	311	308	296	13	309	1	---	1	---	311
Operating switches	108	108	104	3	107	---	---	1	---	108
Striking fixed structures	287	281	269	9	278	---	---	2	3	283
Getting on or off trains	2,474	2,444	2,252	66	2,318	4	55	9	71	2,457
Highway grade accidents	3,789	3,077	68	39	107	2	4	3,974	193	4,280
Struck or run over	948	561	77	45	122	4	4	214	279	623
Flying or falling objects	1,593	1,593	1,474	120	1,594	---	8	13	4	1,619
Assaults	244	244	230	5	235	---	11	---	---	246
Miscellaneous	2,885	2,853	1,921	775	2,696	6	151	30	40	2,923
TOTAL.....	14,611	13,432	8,334	1,444	9,778	19	233	4,255	591	14,876
NONTRAIN INCIDENTS										
Coupling incidents	1,933	1,933	1,727	207	1,934	---	---	1	---	1,935
Operating switches	2,115	2,115	1,915	203	2,118	---	---	---	---	2,118
Getting on/off locos or cars	2,628	2,626	1,787	677	2,464	17	115	33	10	2,639
Servicing or maintenance of equip	13,659	13,656	160	13,579	13,739	54	---	30	3	13,826
Maintenance of way and structures	18,161	18,145	75	18,096	18,171	54	---	44	---	18,269
Involving freight, baggage, etc.	273	273	21	243	264	2	5	3	---	274
Involving windows, doors, etc.	1,165	1,162	296	804	1,100	14	7	42	1	1,164
Involving passenger car doors	31	31	7	16	23	---	8	---	---	31
Stumbling, falling not on car/loco	4,750	4,741	1,936	2,239	4,175	307	46	218	15	4,761
Flying/falling objs, burns, etc.	1,949	1,940	1,050	840	1,890	23	7	33	15	1,968
Assaults to persons	277	275	87	170	257	14	2	5	1	279
Miscellaneous	4,660	4,624	1,853	2,561	4,414	104	4	187	33	4,742
TOTAL.....	51,601	51,521	10,914	39,635	50,549	589	194	596	78	52,006
GRAND TOTAL										
	76,574	75,280	19,868	41,160	61,028	615	503	5,032	689	67,867

TABLE 101-C FATALITIES FOR RAPID TRANSIT CARRIERS
BY CLASS OF ACCIDENT, 1977

	Total Acci- dents	Fatal Acci- dents	Employees on duty.... Trainmen Other Total	Empl not on duty	Passen- gers	Non tres- passers	Tres- passers	Total Killed
TRAIN ACCIDENTS								
Collisions	20	1	1	---	1	---	---	12
Derailements	21	---	---	---	---	---	---	---
Grade crossing	1	---	---	---	---	---	---	---
Other train accidents	18	---	---	---	---	---	---	---
TOTAL.....	60	1	1	---	1	---	---	12
TRAIN INCIDENTS								
Coupling incidents	1	---	---	---	---	---	---	---
Operating locomotives	25	---	---	---	---	---	---	---
Operating rail motor car	22	---	---	---	---	---	---	---
Operating handbrakes	---	---	---	---	---	---	---	---
Operating switches	2	---	---	---	---	---	---	---
Striking fixed structures	2	---	---	---	---	---	---	---
Getting on or off trains	107	1	---	1	---	---	---	1
Highway grade accidents	2	---	---	---	---	---	---	---
Struck or run over	98	36	---	---	---	2	32	36
Flying or falling objects	61	---	---	---	---	---	---	---
Assaults	101	---	---	---	---	---	---	---
Miscellaneous	445	6	---	1	---	4	1	6
TOTAL.....	866	43	---	2	---	6	2	43
NONTRAIN INCIDENTS								
Coupling incidents	11	---	---	---	---	---	---	---
Operating switches	12	---	---	---	---	---	---	---
Getting on/off locos or cars	208	---	---	---	---	---	---	---
Servicing or maintenance of equip	881	---	---	---	---	---	---	---
Maintenance of way and structures	1,075	1	---	---	---	---	1	1
Involving freight, baggage, etc.	16	---	---	---	---	---	---	---
Involving windows, doors, etc.	124	---	---	---	---	---	---	---
Involving passenger car doors	148	---	---	---	---	---	---	---
Stumbling, falling not on car/loco	2,715	4	---	---	---	2	2	4
Flying/falling objs, burns, etc.	183	1	---	---	---	---	1	1
Assaults to persons	440	7	---	---	---	7	---	7
Miscellaneous	481	2	---	1	---	1	---	2
TOTAL.....	6,294	15	---	1	---	10	4	15
GRAND TOTAL	7,220	59	1	3	4	17	12	70

TABLE 101-D NON-FATAL CASUALTIES FOR RAPID TRANSIT CARRIERS
BY CLASS OF ACCIDENT, 1977

	Total acci- dents	Nonfatal acci- dents	Employees on duty....			Empl not on duty	Passen- gers	Non Tres- passers	Tres- passers	Total Non-Fatal Casualties
			Trainmen	Other	Total					
TRAIN ACCIDENTS										
Collisions	20	19	14	6	20	---	204	3	---	227
Deraillments	21	21	1	---	1	---	---	---	---	1
Grade crossing	1	1	1	1	2	---	---	---	---	2
Other train accidents	18	18	---	---	---	---	---	---	---	---
TOTAL.....	60	59	16	7	23	---	204	3	---	230
TRAIN INCIDENTS										
Coupling accidents	1	1	1	---	1	---	---	---	---	1
Operating locomotives	25	25	17	7	24	---	---	1	---	25
Operating rail motor car	22	22	13	2	15	---	6	1	---	22
Operating handbrakes	---	---	---	---	---	---	---	---	---	---
Operating switches	2	2	---	2	2	---	---	---	---	2
Striking fixed structures	2	2	1	---	1	---	1	---	---	2
Getting on or off trains	107	106	3	2	5	---	112	4	---	121
Highway grade accidents	2	2	---	1	1	---	---	---	1	2
Struck or run over	98	62	1	2	3	---	2	30	31	66
Flying or falling objects	61	61	43	7	50	1	10	1	---	62
Assaults	101	101	44	7	51	---	55	2	---	108
Miscellaneous	445	439	106	40	146	---	302	9	4	461
TOTAL.....	866	823	229	70	299	1	488	48	36	872
NONTRAIN INCIDENTS										
Coupling incidents	11	11	8	3	11	---	---	---	---	11
Operating switches	12	12	5	7	12	---	---	---	---	12
Getting on/off locos or cars	208	208	68	44	112	---	98	3	---	213
Servicing or maintenance of equip	881	881	16	895	911	---	---	1	---	912
Maintenance of way and structures	1,075	1,074	72	1,039	1,111	---	---	6	---	1,117
Involving freight, baggage, etc.	16	16	1	14	15	---	---	1	---	16
Involving windows, doors, etc.	124	124	61	59	120	---	1	3	---	124
Involving passenger car doors	148	148	1	1	2	---	143	6	---	151
Stumbling, falling not on car/loco	2,715	2,711	135	583	718	2	115	1,831	200	2,866
Flying/falling objs, burns, etc.	183	182	40	135	175	---	11	3	1	190
Assaults to persons	440	433	69	145	214	---	88	162	---	464
Miscellaneous	481	479	58	408	466	---	15	19	3	503
TOTAL.....	6,294	6,279	534	3,333	3,867	2	471	2,035	204	6,579
GRAND TOTAL	7,220	7,161	779	3,410	4,189	3	1,163	2,086	240	7,681

TABLE 102-A FATALITIES IN ACCIDENTS RESULTING FROM HUMAN FACTORS BY SPECIFIC CAUSE
CLASS I AND CLASS II RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty.... Trainmen	Other	Total	Emp not on duty	Passen- gers	Non tres- passers	Tres- passers	Total Killed
BRAKES, USE OF										
500	Automatic brake, improper use	20	---	---	---	---	---	---	---	---
501	Dynamic brake, improper use	7	---	---	---	---	---	---	---	---
502	Failure to secure engine (R.R. emp.)	43	---	---	---	---	---	---	---	---
503	Failure to secure hnd brk (R.R. emp)	95	---	---	---	---	---	---	---	---
504	Failure to apply sufficient hand brake	57	---	---	---	---	---	---	---	---
505	Failure to apply hnd brk on car (emp.)	33	---	---	---	---	---	---	---	---
506	Fail. to secure eng/car (Non R.R. emp)	14	---	---	---	---	---	---	---	---
507	Independent (eng.) brake, improper use	15	---	---	---	---	---	---	---	---
508	Fail. to control spd,hnd brk (R.R.emp)	14	---	---	---	---	---	---	---	---
509	Other causes involving use of brakes	28	---	---	---	---	---	---	---	---
	SUBTOTAL.....	326	---	---	---	---	---	---	---	---
EMPLOYEE PHYSICAL CONDITION										
513	Employee falling asleep	3	---	---	---	---	---	---	---	---
	SUBTOTAL.....	3	---	---	---	---	---	---	---	---
FLAGGING, FIXED, HAND AND RADIO SIGNALS										
520	Fixed signal, failure to comply	22	---	---	---	---	---	---	---	---
521	Flagging, improper or failure to flag	7	---	---	---	---	---	---	---	---
522	Flagging signal, failure to comply	4	---	---	---	---	---	---	---	---
523	Hand signal, failure to comply	8	---	---	---	---	---	---	---	---
524	Hand signal improper	6	---	---	---	---	---	---	---	---
525	Hand signal, failure to give/receive	4	---	---	---	---	---	---	---	---
526	Radio communicatio, failure to comply	6	---	---	---	---	---	---	---	---
527	Radio communication, improper	2	---	---	---	---	---	---	---	---
528	Radio comm., failure to give/receive	11	---	---	---	---	---	---	---	---
529	Flagging, fixed, hand & radio (other)	6	---	---	---	---	---	---	---	---
	SUBTOTAL.....	76	---	---	---	---	---	---	---	---
OTHER RULES AND INSTRUCTIONS										
530	Car(s) shoved out & left out of clear	65	---	---	---	---	---	---	---	---
531	Cars left foul	72	---	---	---	---	---	---	---	---
532	Derail, failure to apply or remove	37	---	---	---	---	---	---	---	---
533	Failure to stop train in clear	105	---	---	---	---	---	---	---	---
534	Hazmat regulations, failure to comply	3	---	---	---	---	---	---	---	---
535	Instruction to trn/yard crew improper	40	---	---	---	---	---	---	---	---
536	Mtr car/on-trk eqp rules,fail to cmply	37	---	---	---	---	---	---	---	---
537	Equip move without authority (RR emp)	28	---	---	---	---	---	---	---	---
538	Showing move, missing man at lead	181	---	---	---	---	---	---	---	---
539	Showing movement, fail to control	78	---	---	---	---	---	---	---	---
540	Skate, failure to remove or place	9	---	---	---	---	---	---	---	---
541	Special op. instr., failure to comply	37	---	---	---	---	---	---	---	---
542	Trn ord/timetable auth, fail to comply	12	1	---	1	---	---	---	---	1
543	Trn ord(radio)err in prep/trans/deliv	5	---	---	---	---	---	---	---	---
544	Trn ord(written)err in preparation,etc	5	---	---	---	---	---	---	---	---
	SUBTOTAL.....	714	1	---	1	---	---	---	---	1
SPEED										
550	Coupling speed excessive	82	---	---	---	---	---	---	---	---
553	Switch movement, excessive speed	46	---	---	---	---	---	---	---	---
554	Trn inside yrd limit, excess speed	35	---	---	---	---	---	---	---	---
555	Trn out yrd limit,clear blk,excess spd	37	1	---	1	---	---	---	---	1
559	Other Causes involving excessive speed	21	---	---	---	---	---	---	---	---
	SUBTOTAL.....	221	1	---	1	---	---	---	---	1
SWITCHES, USE OF										
560	Spring switch not clear before rverse	32	---	---	---	---	---	---	---	---
561	Switch improperly lined	279	2	---	2	---	---	---	---	2
562	Switch not latched or locked	36	---	---	---	---	---	---	---	---
563	Switch previously run through	116	1	---	1	---	---	---	---	1
	SUBTOTAL.....	463	3	---	3	---	---	---	---	3
MISCELLANEOUS										
570	Buffing or slack action excessive	374	---	---	---	---	---	---	---	---
571	Failure to couple	30	---	---	---	---	---	---	---	---
572	Lateral drawbar force on curve excess	117	---	---	---	---	---	---	---	---
573	Moving car,loading ramp not positioned	3	---	---	---	---	---	---	---	---
574	Passed couplers	132	---	---	---	---	---	---	---	---
575	Retarder, improper manual operation	14	---	---	---	---	---	---	---	---
576	Retarder yard skate improperly applied	4	---	---	---	---	---	---	---	---
599	Other train operation/human factors	82	---	---	---	---	---	---	---	---
	SUBTOTAL.....	756	---	---	---	---	---	---	---	---
	GRAND TOTAL.....	2559	5	---	5	---	---	---	---	5

TABLE 102-B NONFATAL CASUALTIES IN ACCIDENTS RESULTING FROM HUMAN FACTORS BY SPECIFIC CAUSE
CLASS I AND CLASS II RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty Trainmen	Other	Total	Emp not on duty	Passengers	Non trespassers	Trespassers	Total Injured
BRAKES, USE OF										
500	Automatic brake, improper use	20	3	---	3	---	---	---	---	3
501	Dynamic brake, improper use	7	---	---	---	---	---	---	---	---
502	Failure to secure engine (R.R. emp.)	43	6	---	6	---	---	---	---	6
503	Failure to secure hnd brk (R.R. emp.)	95	6	---	6	---	---	---	---	6
504	Failure to apply sufficient hand brake	57	2	---	2	---	---	---	---	2
505	Failure to apply hnd brk on car (emp.)	33	---	---	---	---	---	---	---	---
506	Fail. to secure eng/car (Non R.R. emp.)	14	4	---	4	---	---	---	---	4
507	Independent (eng.) brake, improper use	15	---	---	---	---	---	---	---	---
508	Fail. to control spd,hnd brk (R.R. emp.)	14	1	---	1	---	---	---	---	1
509	Other causes involving use of brakes	28	5	---	5	---	---	---	---	5
SUBTOTAL.....		326	27	---	27	---	---	---	---	27
EMPLOYEE PHYSICAL CONDITION										
513	Employee falling asleep	3	3	4	7	---	---	---	---	7
SUBTOTAL.....		3	3	4	7	---	---	---	---	7
FLAGGING, FIXED, HAND AND RADIO SIGNALS										
520	Fixed signal, failure to comply	22	18	1	19	---	---	---	---	19
521	Flagging, improper or failure to flag	7	5	---	5	---	---	---	---	5
522	Flagging signal, failure to comply	4	---	---	---	---	---	---	---	---
523	Hand signal, failure to comply	8	2	---	2	---	---	---	---	2
524	Hand signal improper	6	---	---	---	---	---	---	---	---
525	Hand signal, failure to give/receive	4	---	---	---	---	---	---	---	---
526	Radio communication, failure to comply	6	1	---	1	---	---	---	---	1
527	Radio communication, improper	2	---	---	---	---	---	---	---	---
528	Radio comm., failure to give/receive	11	3	---	3	---	---	---	---	3
529	Flagging, fixed, hand & radio (other)	6	---	---	---	---	---	---	---	---
SUBTOTAL.....		76	29	1	30	---	---	---	---	30
OTHER RULES AND INSTRUCTIONS										
530	Car(s) shoved out & left out of clear	65	1	---	1	---	---	---	---	1
531	Cars left foul	72	1	---	1	---	---	---	---	1
532	Deraill, failure to apply or remove	37	3	---	3	---	---	---	---	3
533	Failure to stop train in clear	105	18	4	22	---	---	3	---	25
534	Hazmat regulations, failure to comply	3	---	---	---	---	---	---	---	---
535	Instruction to trn/yard crew improper	40	4	---	4	---	---	---	---	4
536	Htr car/on-trk eqp rules,fail to cmPLY	37	---	8	8	---	---	---	---	8
537	Equip move without authority (RR emp)	28	8	1	9	---	---	---	---	9
538	Shoving move, missing man at lead	181	3	---	3	---	---	---	---	3
539	Shoving movement, fail to control	78	4	---	4	---	---	---	---	4
540	Skate, failure to remove or place	9	1	---	1	---	---	---	---	1
541	Special op. instr., failure to comply	37	7	1	8	---	---	---	---	8
542	Trn ord/timetable auth, fail to comply	12	10	---	10	---	---	---	---	10
543	Trn ord (radio) err in prep/trans/deliv	5	---	---	---	---	---	---	---	---
544	Trn ord (written) err in preparation, etc	5	---	1	1	---	---	---	---	1
SUBTOTAL.....		714	60	15	75	---	---	3	---	78
SPRED										
550	Coupling speed excessive	82	11	3	14	---	---	---	---	14
553	Switch movement, excessive speed	46	7	---	7	---	---	---	---	7
554	Trn inside yrd limit, excess speed	35	19	---	19	---	---	---	---	19
555	Trn out yrd limit, clear blk, excess spd	37	4	---	4	---	---	---	---	4
559	Other Causes involving excessive speed	21	1	1	2	---	---	---	---	2
SUBTOTAL.....		221	42	4	46	---	---	---	---	46
SWITCHES, USE OF										
560	Spring switch not clear before reverse	32	---	---	---	---	---	---	---	---
561	Switch improperly lined	279	24	3	27	7	9	1	---	44
562	Switch not latched or locked	36	2	---	2	---	---	---	---	2
563	Switch previously run through	116	5	---	5	---	---	---	---	5
SUBTOTAL.....		463	31	3	34	7	9	1	---	51
MISCELLANEOUS										
570	Buffing or slack action excessive	374	10	---	10	---	---	2	---	12
571	Failure to couple	30	2	---	2	---	---	---	---	2
572	Lateral drawbar force on curve excess	117	1	---	1	---	2	---	---	3
573	Moving car, loading ramp not positioned	3	---	---	---	---	---	---	---	---
574	Passed couplers	132	---	---	---	---	---	---	---	---
575	Retarder, improper manual operation	14	---	---	---	---	---	---	---	---
576	Retarder yard skate improperly applied	4	---	---	---	---	---	---	---	---
599	Other train operation/human factors	82	15	1	16	---	---	---	---	16
SUBTOTAL.....		756	28	1	29	---	2	2	---	33
GRAND TOTAL.....		2559	220	28	248	7	11	6	---	272

TABLE 102-C NUMBER OF ACCIDENTS RESULTING FROM HUMAN FACTORS BY SPECIFIC CAUSE, 1977
CLASS I AND CLASS II RAILROADS

Cause No.	Causes	Collis- ions	Derail- ments	Other	Total
BRAKES, USE OF					
500	Automatic brake, improper use	3	15	2	20
501	Dynamic brake, improper use	---	7	---	7
502	Failure to properly secure engine(s) (railroad employee)	30	11	2	43
503	Failure to properly secure hand brake on car(s) (railroad employee)	75	19	1	95
504	Failure to apply sufficient number of hand brakes on car(s) (R.R. employee)	32	22	3	57
505	Failure to apply hand brakes on car(s) (railroad employee)	22	8	3	33
506	Failure to properly secure engine(s) or car(s) (non-railroad employee)	7	6	1	14
507	Independent (engine) brake, improper use	3	12	---	15
508	Failure to control speed of car using hand brake (railroad employee)	7	3	4	14
509	Use of brakes (cause code not listed)	13	13	2	28
SUBTOTAL.....		192	116	10	326
EMPLOYEE PHYSICAL CONDITION					
513	Employee falling asleep	3	---	---	3
SUBTOTAL.....		3	---	---	3
FLAGGING, FIXED, HAND AND RADIO SIGNALS					
520	Fixed signal, failure to comply	17	3	2	22
521	Flagging, improper or failure to flag	7	---	---	7
522	Flagging signal, failure to comply	2	1	1	4
523	Hand signal, failure to comply	6	2	---	8
524	Hand signal improper	2	2	2	6
525	Hand signal, failure to give/receive	3	1	---	4
526	Radio communication, failure to comply	4	1	1	6
527	Radio communication, improper	1	1	---	2
528	Radio communication, failure to give/receive	9	2	---	11
529	Flagging, fixed, hand and radio signals (cause code not listed)	2	4	---	6
SUBTOTAL.....		53	17	6	76
OTHER RULES AND INSTRUCTIONS					
530	Car(s) shoved out and left out of clear	54	10	1	65
531	Cars left foul	64	4	4	72
532	Derail, failure to apply or remove	9	28	---	37
533	Failure to stop train in clear	90	12	3	105
534	Hazardous materials regulations, failure to comply	1	1	1	3
535	Instruction to train/yard crew improper	31	7	2	40
536	Motor car or on-track equipment rules, failure to comply	29	---	8	37
537	Movement of engine(s) or car(s) without authority (railroad employee)	18	7	3	28
538	Shoving movement, absence of man on or at leading end of movement	133	35	13	181
539	Shoving movement, man on or at leading end of movement, failure to control	58	16	4	78
540	Skate, failure to remove or place	5	3	1	9
541	Special operating instruction, failure to comply	21	13	3	37
542	Train order or timetable authority, failure to comply	9	3	---	12
543	Train orders, radio, error in preparation, transmission or delivery	4	1	---	5
544	Train orders, written, error in preparation, transmission or delivery	2	3	---	5
SUBTOTAL.....		528	143	43	714
SPEED					
550	Coupling speed excessive	31	39	12	82
553	Switch movement, excessive speed	25	19	2	46
554	Train inside yard limits, excessive speed	14	20	1	35
555	Train outside yard limits under clear block, excessive speed	3	34	---	37
559	Speed (cause code not listed)	6	13	2	21
SUBTOTAL.....		79	125	17	221
SWITCHES, USE OF					
560	Spring switch not cleared before reversing	---	32	---	32
561	Switch improperly lined	122	147	10	279
562	Switch not latched or locked	4	32	---	36
563	Switch previously run through	7	109	---	116
SUBTOTAL.....		133	320	10	463
MISCELLANEOUS					
570	Buffing or slack action excessive	7	365	2	374
571	Failure to couple	21	4	5	30
572	Lateral drawbar force on curve excessive	---	117	---	117
573	Moving cars while loading ramp or bridge plate not in proper position	1	---	2	3
574	Passed couplers	18	108	6	132
575	Retarder, improper manual operation	6	3	5	14
576	Retarder, yard skate improperly applied	3	1	---	4
599	Other train operation - human factors	41	32	9	82
SUBTOTAL.....		97	630	29	756
GRAND TOTAL.....		1,085	1,351	123	2,559

TABLE 102-D FATALITIES IN ACCIDENTS RESULTING FROM HUMAN FACTORS BY SPECIFIC CAUSE
RAPID TRANSIT RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty.... Trainmen Other	Emp not on duty	Passen- gers	Non tres- passers	Tres- passers	Total Killed
BRAKES, USE OF								
500	Automatic brake, improper use	1	---	---	---	---	---	---
	SUBTOTAL.....	1	---	---	---	---	---	---
FLAGGING, FIXED, HAND AND RADIO SIGNALS								
529	Flagging, fixed, hand & radio (other)	1	---	---	11	---	---	11
	SUBTOTAL.....	1	---	---	11	---	---	11
OTHER RULES AND INSTRUCTIONS								
533	Failure to stop train in clear	3	1	---	---	---	---	1
536	Mtr car/on-trk eqp rules, fail to comply	7	---	---	---	---	---	---
538	Shoving move, missing man at lead	3	---	---	---	---	---	---
539	Shoving movement, fail to control	1	---	---	---	---	---	---
542	Trn ord/timetable auth, fail to comply	1	---	---	---	---	---	---
	SUBTOTAL.....	15	1	---	---	---	---	1
SPEED								
553	Switch movement, excessive speed	1	---	---	---	---	---	---
554	Trn inside yrd limit, excess speed	2	---	---	---	---	---	---
559	Other Causes involving excessive speed	2	---	---	---	---	---	---
	SUBTOTAL.....	5	---	---	---	---	---	---
SWITCHES, USE OF								
561	Switch improperly lined	1	---	---	---	---	---	---
563	Switch previously run through	3	---	---	---	---	---	---
	SUBTOTAL.....	4	---	---	---	---	---	---
MISCELLANEOUS								
599	Other train operation/human factors	1	---	---	---	---	---	---
	SUBTOTAL.....	1	---	---	---	---	---	---
	GRAND TOTAL.....	27	1	---	11	---	---	12

TABLE 102-E NONFATAL CASUALTIES IN ACCIDENTS RESULTING FROM HUMAN FACTORS BY SPECIFIC CAUSE
RAPID TRANSIT RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty.... Trainmen Other	Emp not on duty	Passen- gers	Non tres- passers	Tres- passers	Total Injured
BRAKES, USE OF								
500	Automatic brake, improper use	1	---	---	---	---	---	---
	SUBTOTAL.....	1	---	---	---	---	---	---
FLAGGING, FIXED, HAND AND RADIO SIGNALS								
529	Flagging, fixed, hand & radio (other)	1	4	---	191	---	---	195
	SUBTOTAL.....	1	4	---	191	---	---	195
OTHER RULES AND INSTRUCTIONS								
533	Failure to stop train in clear	3	---	---	---	---	---	---
536	Mtr car/on-trk eqp rules, fail to comply	7	5	---	---	---	---	5
538	Shoving move, missing man at lead	3	---	---	---	---	---	---
539	Shoving movement, fail to control	1	---	---	---	---	---	---
542	Trn ord/timetable auth, fail to comply	1	---	---	---	---	---	---
	SUBTOTAL.....	15	5	---	---	---	---	5
SPEED								
553	Switch movement, excessive speed	1	---	---	2	---	---	2
554	Trn inside yrd limit, excess speed	2	---	---	---	---	---	---
559	Other Causes involving excessive speed	2	2	---	10	---	---	12
	SUBTOTAL.....	5	2	---	12	---	---	14
SWITCHES, USE OF								
561	Switch improperly lined	1	---	---	---	---	---	---
563	Switch previously run through	3	---	---	---	---	---	---
	SUBTOTAL.....	4	---	---	---	---	---	---
MISCELLANEOUS								
599	Other train operation/human factors	1	---	---	---	---	---	---
	SUBTOTAL.....	1	---	---	---	---	---	---
	GRAND TOTAL.....	27	11	---	203	---	---	214

TABLE 102-P NUMBER OF ACCIDENTS RESULTING FROM HUMAN FACTORS BY SPECIFIC CAUSE, 1977
RAPID TRANSIT RAILROADS

Cause No.	Causes	Collis- ions	Derail- ments	Other	Total
BRAKES, USE OF					
500	Automatic brake, improper use	---	---	1	1
	SUBTOTAL.....	---	---	1	1
FLAGGING, FIXED, HAND AND RADIO SIGNALS					
529	Flagging, fixed, hand and radio signals (cause code not listed)	1	---	---	1
	SUBTOTAL.....	1	---	---	1
OTHER RULES AND INSTRUCTIONS					
533	Failure to stop train in clear	1	---	2	3
536	Motor car or on-track equipment rules, failure to comply	7	---	---	7
538	Shoving movement, absence of man on or at leading end of movement	1	1	1	3
539	Shoving movement, man on or at leading end of movement, failure to control	1	---	---	1
542	Train order or timetable authority, failure to comply	1	---	---	1
	SUBTOTAL.....	11	1	3	15
SPEED					
553	Switch movement, excessive speed	1	---	---	1
554	Train inside yard limits, excessive speed	2	---	---	2
559	Speed (cause code not listed)	1	---	1	2
	SUBTOTAL.....	4	---	1	5
SWITCHES, USE OF					
561	Switch improperly lined	---	1	---	1
563	Switch previously run through	---	3	---	3
	SUBTOTAL.....	---	4	---	4
MISCELLANEOUS					
599	Other train operation - human factors	1	---	---	1
	SUBTOTAL.....	1	---	---	1
GRAND TOTAL.....		17	5	5	27

TABLE 103-A FATALITIES IN ACCIDENTS RESULTING FROM MECHANICAL AND ELECTRICAL FAILURES BY SPECIFIC CAUSE
CLASS I AND CLASS II RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty..... Trainmen	Other	Emp not Total on duty	Passen- gers	Non tres- passers	Tres- passers	Total Killed
BRAKES									
400	Air hose uncoupled or burst	43	---	---	---	---	---	---	---
400L	Air hose uncoupled or burst - loco	3	---	---	---	---	---	---	---
401	Hydraulic hose uncoupled or burst	1	---	---	---	---	---	---	---
402	Broken brake pipe or connections	10	---	---	---	---	---	---	---
403	Obstructed brake pipe	2	---	---	---	---	---	---	---
404	Other brake component failure, etc.	24	---	---	---	---	---	---	---
404L	Other brake component failure - loco	3	---	---	---	---	---	---	---
405	Brk valve malf. (undesired emergency)	21	1	---	1	---	---	---	1
405L	Brk valve malf - loco (emergency appl)	3	---	---	---	---	---	---	---
406	Brake valve malfunction/stuck brake/etc	17	---	---	---	---	---	---	---
406L	Brk valve malf./stuck brake/etc - loco	2	---	---	---	---	---	---	---
407	Rigging down or dragging	61	---	---	---	---	---	---	---
407L	Rigging down or dragging - loco	4	---	---	---	---	---	---	---
408	Hand brake/gear broken or defective	14	---	---	---	---	---	---	---
409	Hand brk linkage/connections failure	10	---	---	---	---	---	---	---
410	Other brake failure(not on locomotive)	15	---	---	---	---	---	---	---
410L	Other brake failure - locomotive	5	---	---	---	---	---	---	---
SUBTOTAL.....		238	1	---	1	---	---	---	1
TRAILER OR CONTAINER ON FLAT CAR									
411	Broken or defective tiedown equipment	15	---	---	---	---	---	---	---
412	Broken or defective container	1	---	---	---	---	---	---	---
413	Broken or defective trailer	1	---	---	---	---	---	---	---
419	Oth trailer/container on flat car fail	9	---	---	---	---	---	---	---
SUBTOTAL.....		26	---	---	---	---	---	---	---
BODY									
420	Body bolster broken or defective	25	---	---	---	---	---	---	---
421	Center sill broken or bent	41	---	---	---	---	1	---	1
422	Draft sill broken or bent	10	---	---	---	---	---	---	---
423	Center plate broken or defective	56	---	---	---	---	---	---	---
424	Center plate disengaged from truck	46	---	---	---	---	---	---	---
425	Center pin broken or missing	18	---	---	---	---	---	---	---
426	Center plate attachment defective	8	---	---	---	---	---	---	---
429	Other causes due to body (not loco)	18	---	---	---	---	---	---	---
SUBTOTAL.....		222	---	---	---	---	1	---	1
COUPLER AND DRAFT SYSTEM									
430	Knuckle broken or defective	36	---	---	---	---	---	---	---
430L	Knuckle broken or defective - loco	1	---	---	---	---	---	---	---
431	Coupler mismatch, high/low	48	---	---	---	---	---	---	---
431L	Coupler mismatch, high/low - loco	1	---	---	---	---	---	---	---
432	Coupler drawhead broken or defective	99	---	---	---	---	---	---	---
432L	Coup. drawhead broken/defect. - loco	1	---	---	---	---	---	---	---
433	Coupler retainer pin/cross key missing	21	---	---	---	---	---	---	---
433L	Coup. retain pin/cross key miss.-loco	1	---	---	---	---	---	---	---
434	Draft gear/mechanism broken/defective	40	---	---	---	---	---	---	---
434L	Draft gear/mech. broken/defective-loco	1	---	---	---	---	---	---	---
435	Coupler carrier broken or defective	22	---	---	---	---	---	---	---
435L	Coupler carrier broken/defective-loco	1	---	---	---	---	---	---	---
436	Coupler shank broken or defective	12	---	---	---	---	---	---	---
439	Other coupler and draft system causes	42	---	---	---	---	---	---	---
439L	Other coupler/draft system causes-loco	2	---	---	---	---	---	---	---
SUBTOTAL.....		328	---	---	---	---	---	---	---
TRUCK COMPONENTS									
440	Side bearing clearance improper	145	---	---	---	---	---	---	---
441	Side bearing(s) broken	37	---	---	---	---	---	---	---
442	Side bearing(s) missing	36	---	---	---	---	---	---	---
443	Truck bolster broken	28	---	---	---	---	---	---	---
444	Side frame broken	9	---	---	---	---	---	---	---
445	Truck (stiff/improper lateral)	88	---	---	---	---	---	---	---
445L	Truck (stiff/improper lateral) - loco	4	---	---	---	---	---	---	---

(CONT.) TABLE 103-A FATALITIES IN ACCIDENTS RESULTING FROM MECHANICAL AND ELECTRICAL FAILURES BY SPECIFIC CAUSE
CLASS I AND CLASS II RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty Trainmen	Other	Emp not on duty Total	Passen- gers	Non tres- passers	Tres- passers	Total Killed
TRUCK COMPONENTS (CONT.)									
446	Defective snubbing	5	---	---	---	---	---	---	---
447	Broken/missing/defective springs	7	---	---	---	---	---	---	---
447L	Broken/missing/defective springs-loco	1	---	---	---	---	---	---	---
449	Other truck component causes	24	---	---	---	---	---	---	---
SUBTOTAL.....		384	---	---	---	---	---	---	---
AXLES AND JOURNAL BEARINGS									
450	Broken or bent between wheel seats	13	---	---	---	---	---	---	---
450L	Broken/bent between wheel seats-loco	2	---	---	---	---	---	---	---
451	Journal (plain) failure - overheating	182	---	---	---	---	---	---	---
451L	Journal (plain) failure-overheat (loco)	2	---	---	---	---	---	---	---
452	Journal (R. B.) failure - overheat	72	---	---	---	---	---	---	---
452L	Journal (R. B.) failure-overheat (loco)	2	---	---	---	---	---	---	---
453	Journal fractured, new cold break	8	---	---	---	---	---	---	---
453L	Journal fracture, new cold break (loco)	2	---	---	---	---	---	---	---
454	Journal fract., cold brk (prev. O.heat)	1	---	---	---	---	---	---	---
459	Axles and journal bearings (other)	10	---	---	---	---	---	---	---
SUBTOTAL.....		294	---	---	---	---	---	---	---
WHEELS									
460	Broken flange	47	---	---	---	---	---	---	---
461	Broken rim	44	---	---	---	---	---	---	---
461L	Broken rim - locomotive	4	---	---	---	---	---	---	---
462	Broken plate	40	---	---	---	---	---	---	---
462L	Broken plate - locomotive	4	---	---	---	---	---	---	---
463	Broken hub	10	---	---	---	---	---	---	---
464	Worn flange	155	---	---	---	---	---	---	---
464L	Worn flange - locomotive	5	---	---	---	---	---	---	---
465	Worn thread	4	---	---	---	---	---	---	---
466	Damaged flange/thread, thermal/flat	12	---	---	---	---	---	---	---
466L	Dmg flange/thread, thermal/flat - loco	1	---	---	---	---	---	---	---
467	Loose wheel	42	---	---	---	---	---	---	---
467L	Loose wheel - locomotive	1	---	---	---	---	---	---	---
469	Other causes involving wheels-not loco	35	---	---	---	---	---	---	---
469L	Other causes involving wheel - loco	4	---	---	---	---	---	---	---
SUBTOTAL.....		408	---	---	---	---	---	---	---
LOCOMOTIVES									
470L	Running gear failure - locomotive	2	---	---	---	---	---	---	---
471L	Traction motor failure - locomotive	7	---	---	---	---	---	---	---
472L	Crank case/air box explosion - loco	5	---	---	---	---	---	---	---
473L	Oil fire - locomotive	7	---	---	---	---	---	---	---
474L	Electrically caused fire - locomotive	52	---	---	---	---	---	---	---
475L	Current collector system - loco	1	---	---	---	---	---	---	---
477L	Broke/defect swing hanger or plank-loc	1	---	---	---	---	---	---	---
479L	Other causes involving locomotives	27	---	---	---	---	---	---	---
SUBTOTAL.....		102	---	---	---	---	---	---	---
DOORS									
481	Box car plug door, attachment defective	1	---	---	---	---	---	---	---
484	Box car door(not plug) attach defect.	3	---	---	---	---	---	---	---
485	Bottom outlet car door open	9	---	---	---	---	---	---	---
486	Bottom outlet car door attach defect.	4	---	---	---	---	---	---	---
489	Other causes involving doors	3	---	---	---	---	---	---	---
SUBTOTAL.....		20	---	---	---	---	---	---	---
GENL MECH AND ELECTRICAL FAILURES									
499	General mech/elect failures-not loco	41	---	---	---	---	---	---	---
499L	General mech/elect failures - loco	1	---	---	---	---	---	---	---
SUBTOTAL.....		42	---	---	---	---	---	---	---
GRAND TOTAL.....		2064	1	---	1	---	1	---	2

TABLE 103-B NONFATAL CASUALTIES IN ACCIDENTS RESULTING FROM MECHANICAL AND ELECTRICAL FAILURES BY SPECIFIC CAUSE CLASS I AND CLASS II RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty.... Trainmen	Other	Total	Emp not on duty	Passen- gers	Non tres- passers	Tres- passers	Total Injured
BRAKES										
400	Air hose uncoupled or burst	43	3	---	3	---	---	---	---	3
400L	Air hose uncoupled or burst - loco	3	---	---	---	---	---	---	---	---
401	Hydraulic hose uncoupled or burst	1	---	---	---	---	---	---	---	---
402	Broken brake pipe or connections	10	2	---	2	---	---	---	---	2
403	Obstructed brake pipe	2	---	---	---	---	---	---	---	---
404	Other brake component failure, etc.	24	1	---	1	---	---	---	---	1
404L	Other brake component failure - loco	3	---	---	---	---	---	---	---	---
405	Brk valve malf. (undesired emergency)	21	4	---	4	---	---	---	---	4
405L	Brk valve malf. - loco (emergency appl)	3	1	---	1	---	---	---	---	1
406	Brake valve malfunction/stuck brake/etc	17	---	---	---	---	---	---	---	---
406L	Brk valve malf./stuck brake/etc - loco	2	1	---	1	---	---	---	---	1
407	Rigging down or dragging	61	2	---	2	---	---	---	---	2
407L	Rigging down or dragging - loco	4	---	---	---	---	---	---	---	---
408	Hand brake/gear broken or defective	14	---	---	---	---	---	---	---	---
409	Hand brk linkage/connections failure	10	---	---	---	---	---	---	---	---
410	Other brake failure(not on locomotive)	15	---	---	---	---	---	---	---	---
410L	Other brake failure - locomotive	5	---	---	---	---	---	---	---	---
SUBTOTAL.....		238	14	---	14	---	---	---	---	14
TRAILER OR CONTAINER ON FLAT CAR										
411	Broken or defective tiedown equipment	15	---	---	---	---	---	---	---	---
412	Broken or defective container	1	---	---	---	---	---	---	---	---
413	Broken or defective trailer	1	---	---	---	---	---	---	---	---
419	Oth trailer/container on flat car fail	9	---	---	---	---	---	---	---	---
SUBTOTAL.....		26	---	---	---	---	---	---	---	---
BODY										
420	Body bolster broken or defective	25	1	---	1	---	---	---	---	1
421	Center sill broken or bent	41	4	1	5	---	---	2	---	7
422	Draft sill broken or bent	10	---	---	---	---	---	---	---	---
423	Center plate broken or defective	56	2	---	2	---	---	---	---	2
424	Center plate disengaged from truck	46	2	---	2	---	---	---	---	2
425	Center pin broken or missing	18	2	---	2	---	---	---	---	2
426	Center plate attachment defective	8	---	---	---	---	---	---	---	---
429	Other causes due to body (not loco)	18	---	---	---	---	---	---	1	1
SUBTOTAL.....		222	11	1	12	---	---	2	1	15
COUPLER AND DRAFT SYSTEM										
430	Knuckle broken or defective	36	6	---	6	---	---	---	---	6
430L	Knuckle broken or defective - loco	1	---	---	---	---	---	---	---	---
431	Coupler mismatch, high/low	48	---	---	---	---	---	---	---	---
431L	Coupler mismatch, high/low - loco	1	---	---	---	---	---	---	---	---
432	Coupler drawhead broken or defective	99	2	---	2	---	---	1	---	3
432L	Coup. drawhead broken/defect. - loco	1	---	---	---	---	---	---	---	---
433	Coupler retainer pin/cross key missing	21	---	---	---	---	---	---	---	---
433L	Coup. retain pin/cross key miss.-loco	1	---	---	---	---	---	---	---	---
434	Draft gear/mechanism broken/defective	40	1	---	1	---	---	2	---	3
434L	Draft gear/mech. broken/defective-loco	1	2	---	2	---	---	---	---	2
435	Coupler carrier broken or defective	22	3	---	3	---	5	---	---	8
435L	Coupler carrier broken/defective-loco	1	---	---	---	---	---	---	---	---
436	Coupler shank broken or defective	12	---	---	---	---	---	---	---	---
439	Other coupler and draft system causes	42	1	---	1	---	---	---	---	1
439L	Other coupler/draft system causes-loco	2	---	---	---	---	---	---	---	---
SUBTOTAL.....		328	15	---	15	---	5	3	---	23
TRUCK COMPONENTS										
440	Side bearing clearance improper	145	4	1	5	---	---	---	---	5
441	Side bearing(s) broken	37	---	---	---	---	---	---	---	---
442	Side bearing(s) missing	36	1	1	2	---	---	---	---	2
443	Truck bolster broken	28	---	---	---	---	---	---	---	---
444	Side frame broken	9	---	---	---	---	---	---	---	---
445	Truck (stiff/improper lateral)	88	2	1	3	---	---	---	---	3
445L	Truck (stiff/improper lateral) - loco	4	---	---	---	---	---	---	---	---

(CONT.) TABLE 103-B NONFATAL CASUALTIES IN ACCIDENTS RESULTING FROM MECHANICAL AND ELECTRICAL FAILURES BY SPECIFIC CAUSE CLASS I AND CLASS II RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty.... Trainmen	Other	Total	Emp not on duty	Passen- gers	Non tres- passers	Tres- passers	Total Injured
TRUCK COMPONENTS (CONT.)										
446	Defective snubbing	5	---	---	---	---	---	---	---	---
447	Broken/missing/defective springs	7	---	---	---	---	---	---	---	---
447L	Broken/missing/defective springs-loco	1	---	---	---	---	---	---	---	---
449	Other truck component causes	24	1	---	1	---	---	---	---	1
SUBTOTAL.....		384	8	3	11	---	---	---	---	11
AXLES AND JOURNAL BEARINGS										
450	Broken or bent between wheel seats	13	1	---	1	---	---	---	---	1
450L	Broken/bent between wheel seats-loco	2	---	---	---	---	---	---	---	---
451	Journal (plain) failure - overheating	182	3	---	3	---	---	---	---	3
451L	Journal (plain) failure-overheat (loco)	2	---	---	---	---	---	---	---	---
452	Journal (R. B.) failure - overheat	72	2	---	2	---	---	---	---	2
452L	Journal (R. B.) failure-overheat (loco)	2	---	---	---	---	---	---	---	---
453	Journal fractured, new cold break	8	1	---	1	---	---	---	---	1
453L	Journal fracture, new cold break (loco)	2	---	---	---	---	---	---	---	---
454	Journal fract., cold brk (prev. O. heat)	1	---	---	---	---	---	---	---	---
459	Axles and journal bearings (other)	10	---	---	---	---	---	---	---	---
SUBTOTAL.....		294	7	---	7	---	---	---	---	7
WHEELS										
460	Broken flange	47	1	1	2	---	---	---	---	2
461	Broken rim	44	---	---	---	---	---	---	---	---
461L	Broken rim - locomotive	4	---	---	---	---	---	---	---	---
462	Broken plate	40	3	2	5	---	6	---	---	11
462L	Broken plate - locomotive	4	---	---	---	---	---	---	---	---
463	Broken hub	10	---	---	---	---	---	---	---	---
464	Worn flange	155	1	---	1	---	---	---	---	1
464L	Worn flange - locomotive	5	---	---	---	---	---	---	---	---
465	Worn thread	4	---	---	---	---	---	---	---	---
466	Damaged flange/thread, thermal/flat	12	---	---	---	---	---	---	---	---
466L	Dmg flange/thread, thermal/flat - loco	1	---	---	---	---	---	---	---	---
467	Loose wheel	42	2	1	3	---	---	---	---	3
467L	Loose wheel - locomotive	1	---	---	---	---	---	---	---	---
469	Other causes involving wheels-not loco	35	---	---	---	---	---	---	---	---
469L	Other causes involving wheel - loco	4	---	---	---	---	---	---	---	---
SUBTOTAL.....		408	7	4	11	---	6	---	---	17
LOCOMOTIVES										
470L	Running gear failure - locomotive	2	---	---	---	---	---	---	---	---
471L	Traction motor failure - locomotive	7	1	---	1	---	---	---	---	1
472L	Crank case/air box explosion - loco	5	3	---	3	---	---	---	---	3
473L	Oil fire - locomotive	7	---	---	---	---	---	---	---	---
474L	Electrically caused fire - locomotive	52	4	---	4	---	---	---	---	4
475L	Current collector system - loco	1	---	---	---	---	---	---	---	---
477L	Broke/defect swing hanger or plank-loc	1	---	---	---	---	---	---	---	---
479L	Other causes involving locomotives	27	1	---	1	---	---	---	---	1
SUBTOTAL.....		102	9	---	9	---	---	---	---	9
DOORS										
481	Box car plug door, attachment defective	1	---	---	---	---	---	---	---	---
484	Box car door (not plug) attach defect.	3	---	---	---	---	---	---	---	---
485	Bottom outlet car door open	9	---	---	---	---	---	---	---	---
486	Bottom outlet car door attach defect.	4	---	---	---	---	---	---	---	---
489	Other causes involving doors	3	---	---	---	---	---	---	---	---
SUBTOTAL.....		20	---	---	---	---	---	---	---	---
GENL MECH AND ELECTRICAL FAILURES										
499	General mech/elect failures-not loco	41	2	1	3	---	---	---	---	3
499L	General mech/elect failures - loco	1	---	---	---	---	---	---	---	---
SUBTOTAL.....		42	2	1	3	---	---	---	---	3
GRAND TOTAL.....		2064	73	9	82	---	11	5	1	99

TABLE 103-C NUMBER OF ACCIDENTS RESULTING FROM MECHANICAL AND ELECTRICAL FAILURES BY SPECIFIC CAUSE, 1977
CLASS I AND CLASS II RAILROADS

Cause No.	Causes	Collis- ions	Derail- ments	Other	Total
BRAKES					
400	Air hose uncoupled or burst	2	39	2	43
400L	Air hose uncoupled or burst - locomotive	---	3	---	3
401	Hydraulic hose uncoupled or burst	1	---	---	1
402	Broken brake pipe or connections	3	7	---	10
403	Obstructed brake pipe (closed angle cock, ice, etc.)	1	1	---	2
404	Other brake components damaged, worn, broken, or disconnected	2	20	2	24
404L	Other brake components damaged, worn, broken, or disconnected - locomotive	1	---	2	3
405	Brake valve malfunction, undesired emergency	---	19	2	21
405L	Brake valve malfunction, undesired emergency - locomotive	---	3	---	3
406	Brake valve malfunction, stuck brake, etc.	1	---	16	17
406L	Brake valve malfunction, stuck brake, etc. - locomotive	---	---	2	2
407	Rigging down or dragging	---	59	2	61
407L	Rigging down or dragging - locomotive	---	4	---	4
408	Hand brake (including gear) broken or defective	8	4	2	14
409	Hand brake linkage and/or connections broken or defective	7	2	1	10
410	Other causes involving brakes	1	6	8	15
410L	Other causes involving brakes - locomotive	1	2	2	5
SUBTOTAL.....		28	169	41	238
TRAILER OR CONTAINER ON FLAT CAR					
411	Broken or defective tiedown equipment	2	5	8	15
412	Broken or defective container	---	1	---	1
413	Broken or defective trailer	---	---	1	1
419	Other causes involving trailer or container on flat car	1	3	5	9
SUBTOTAL.....		3	9	14	26
BODY					
420	Body bolster broken or defective	1	22	2	25
421	Center sill broken or bent	1	25	15	41
422	Draft sill broken or bent	---	10	---	10
423	Center plate broken or defective	---	55	1	56
424	Center plate disengaged from truck (car off center)	---	46	---	46
425	Center pin broken or missing	1	16	1	18
426	Center plate attachment defective	---	8	---	8
429	Other causes involving body	1	15	2	18
SUBTOTAL.....		4	197	21	222
COUPLER AND DRAFT SYSTEM					
430	Knuckle broken or defective	7	29	---	36
430L	Knuckle broken or defective - locomotive	---	1	---	1
431	Coupler mismatch, high/low	7	40	1	48
431L	Coupler mismatch, high/low - locomotive	1	---	---	1
432	Coupler drawhead broken or defective	4	93	2	99
432L	Coupler drawhead broken or defective - locomotive	1	---	---	1
433	Coupler retainer pin/cross key missing	1	18	2	21
433L	Coupler retainer pin/cross key missing - locomotive	1	---	---	1
434	Draft gear/mechanism broken or defective (including yoke)	3	36	1	40
434L	Draft gear/mechanism broken or defective (including yoke) - locomotive	1	---	---	1
435	Coupler carrier broken or defective	2	20	---	22
435L	Coupler carrier broken or defective - locomotive	---	1	---	1
436	Coupler shank broken or defective	---	12	---	12
439	Other causes involving coupler and draft system	5	37	---	42
439L	Other causes involving coupler and draft system - locomotive	---	1	1	2
SUBTOTAL.....		33	288	7	328
TRUCK COMPONENTS					
440	Side bearing clearance improper	1	144	---	145
441	Side bearing(s) broken	---	37	---	37
442	Side bearing(s) missing	---	36	---	36
443	Truck bolster broken	---	25	3	28
444	Side frame broken	---	9	---	9
445	Truck, stiff, improper lateral or improper swivelling	---	87	1	88
445L	Truck, stiff, improper lateral or improper swivelling - locomotive	---	4	---	4

(CONT.) TABLE 103-C NUMBER OF ACCIDENTS RESULTING FROM MECHANICAL AND ELECTRICAL FAILURES BY SPECIFIC CAUSE, 1977
CLASS I AND CLASS II RAILROADS

Cause No.	Causes	Collis- ions	Derail- ments	Other	Total
TRUCK COMPONENTS (CONT.)					
446	Defective snubbing	---	5	---	5
447	Broken, missing, or otherwise defective springs	---	7	---	7
447L	Broken, missing, or otherwise defective springs - locomotive	---	1	---	1
449	Truck components (cause code not listed)	1	23	---	24
SUBTOTAL.....		2	378	4	384
AXLES AND JOURNAL BEARINGS					
450	Broken or bent between wheel seats	---	13	---	13
450L	Broken or bent between wheel seats - locomotive	---	2	---	2
451	Journal (plain) failure from overheating	---	178	4	182
451L	Journal (plain) failure from overheating - locomotive	---	2	---	2
452	Journal (roller bearing) failure from overheating	---	69	3	72
452L	Journal (roller bearing) failure from overheating - locomotive	---	2	---	2
453	Journal fractured, new cold break	---	8	---	8
453L	Journal fractured, new cold break - locomotive	---	2	---	2
454	Journal fractured, cold break (previously overheated)	---	1	---	1
459	Axles and journal bearings (cause code not listed)	---	10	---	10
SUBTOTAL.....		---	287	7	294
WHEELS					
460	Broken flange	---	47	---	47
461	Broken rim	1	43	---	44
461L	Broken rim - locomotive	---	4	---	4
462	Broken plate	---	40	---	40
462L	Broken plate - locomotive	---	4	---	4
463	Broken hub	---	10	---	10
464	Worn flange	4	151	---	155
464L	Worn flange - locomotive	---	5	---	5
465	Worn tread	---	4	---	4
466	Damaged flange or tread, thermal/flat	---	11	1	12
466L	Damaged flange or tread, thermal/flat - locomotive	---	---	1	1
467	Loose wheel	---	42	---	42
467L	Loose wheel - locomotive	---	1	---	1
469	Wheels (cause code not listed)	4	31	---	35
469L	Wheels (cause code not listed) - locomotive	---	3	1	4
SUBTOTAL.....		9	396	3	408
LOCOMOTIVES					
470L	Running gear failure - locomotive	---	1	1	2
471L	Traction motor failure - locomotive	---	2	5	7
472L	Crank case or air box explosion - locomotive	---	---	5	5
473L	Oil fire - locomotive	---	---	7	7
474L	Electrically caused fire - locomotive	---	---	52	52
475L	Current collector system - locomotive	---	---	1	1
477L	Broken or defective swing hanger or spring plank - locomotive	---	1	---	1
479L	Locomotives (cause code not listed) - locomotive	---	10	17	27
SUBTOTAL.....		---	14	88	102
DOORS					
481	Box car plug door, attachment defective	1	---	---	1
484	Box car door, other than plug, attachment defective	---	1	2	3
485	Bottom outlet car door open	---	9	---	9
486	Bottom outlet car door attachment defective	---	4	---	4
489	Doors (cause code not listed, other than locomotive)	---	3	---	3
SUBTOTAL.....		1	17	2	20
GENL MECH AND ELECTRICAL FAILURES					
499	General mechanical and electrical failures	2	23	16	41
499L	General mechanical and electrical failures - locomotive	---	---	1	1
SUBTOTAL.....		2	23	17	42
GRAND TOTAL.....		82	1,778	204	2,064

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TABLE 103-F NUMBER OF ACCIDENTS RESULTING FROM MECHANICAL AND ELECTRICAL FAILURES BY SPECIFIC CAUSE, 1977
RAPID TRANSIT RAILROADS

Cause No.	Causes	Collis- ions	Derail- ments	Other	Total
TRUCK COMPONENTS					
445	Truck, stiff, improper lateral or improper swivelling	---	1	---	1
	SUBTOTAL.....	---	1	---	1
WHEELS					
463	Broken hub	---	1	---	1
469	Wheels (cause code not listed)	---	2	---	2
	SUBTOTAL.....	---	3	---	3
LOCOMOTIVES					
474L	Electrically caused fire - locomotive	---	---	5	5
475L	Current collector system - locomotive	---	---	2	2
	SUBTOTAL.....	---	---	7	7
GENL MECH AND ELECTRICAL FAILURES					
499	General mechanical and electrical failures	---	1	1	2
499L	General mechanical and electrical failures - locomotive	---	---	1	1
	SUBTOTAL.....	---	1	2	3
GRAND TOTAL.....		---	5	9	14

TABLE 104-A FATALITIES IN ACCIDENTS RESULTING FROM TRACK, ROADBED AND STRUCTURES BY SPECIFIC CAUSE
CLASS I AND CLASS II RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty.... Trainmen Other Total	Emp not on duty	Passen- gers	Non tres- passers	Tres- passers	Total Killed
ROADBED DEFECTS								
101	Roadbed settled or soft	114	---	---	---	---	---	---
102	Washout/rain/slide/ice, etc. dmg to trk	53	---	---	---	---	---	---
109	Other roadbed defects	56	---	---	---	---	---	---
	SUBTOTAL.....	223	---	---	---	---	---	---
TRACK GEOMETRY DEFECTS								
110	Wide gage (defect/missing crossties)	747	---	---	---	---	---	---
111	Wide gage (def/missing rail fasteners)	97	---	---	---	---	---	---
112	Wide gage (involving gage rods)	18	---	---	---	---	---	---
113	Wide gage due to worn rail	94	---	---	---	---	---	---
114	Track alignment irregular	97	---	---	---	---	---	---
115	Track alignment irregular (buckled)	103	1	---	1	---	---	1
116	Track profile improper	13	---	---	---	---	---	---
117	Superelevation incorrect	56	---	---	---	---	---	---
119	Cross level irregular at joints	409	---	---	---	---	---	---
120	Cross level irregular not at joints	270	---	---	---	---	---	---
129	Other track geometry defects	78	---	---	---	---	---	---
	SUBTOTAL.....	1982	1	---	1	---	---	1
RAIL AND JOINT BAR DEFECTS								
130	Bolt hole crack or break	76	---	---	---	---	---	---
131	Broken base of rail	242	---	---	---	---	---	---
132	Broken weld, field	12	---	---	---	---	---	---
133	Broken weld, plant	3	---	---	---	---	---	---
134	Detail fracture fm shelling/head check	15	---	---	---	---	---	---
135	Engine burn fracture	3	---	---	---	---	---	---
136	Head/web sep. (outside joint bar limit)	114	---	---	---	---	---	---
137	Head/web sep. (within joint bar limits)	60	---	---	---	---	---	---
138	Horizontal split head	26	---	---	---	---	---	---
139	Piped rail	2	---	---	---	---	---	---
140	Rail defect with joint bar repair	8	---	---	---	---	---	---
141	Transverse/compound fissure	160	---	---	---	---	---	---
142	Vertical split head	134	---	---	---	---	---	---
143	Worn rail	97	---	---	---	---	---	---
144	Mismatched rail-head contour	22	---	---	---	---	---	---
145	Joint bar broken, compromise	4	---	---	---	---	---	---
146	Joint bar broken, insulated	6	---	---	---	---	---	---
147	Joint bar broken, noninsulated	77	---	---	---	---	---	---
148	Joint bolts, broken or missing	31	---	---	---	---	---	---
149	Other rail and joint bar defects	127	---	---	---	---	---	---
	SUBTOTAL.....	1219	---	---	---	---	---	---
FROGS, SWITCHES AND TRACK APPLIANCES								
160	Guard rail loose/broken/etc.	24	---	---	---	---	---	---
161	Switch damaged/out of adjustment	135	---	---	---	---	---	---
162	Switch stand failure (hand oper.)	30	---	---	---	---	---	---
163	Switch connecting/oper. rod fail.	18	---	---	---	---	---	---
164	Stock rail worn/broken/disconnect	13	---	---	---	---	---	---
165	Switch point worn or broken	434	---	---	---	---	---	---
166	Switch rod worn/bent/broken/etc.	10	---	---	---	---	---	---
167	Frog, rigid, worn or broken	18	---	---	---	---	---	---
168	Frog, spring, worn or broken	10	---	---	---	---	---	---
169	Frog, self guarded, worn/broken	9	---	---	---	---	---	---
171	Derail, defective	4	---	---	---	---	---	---
173	Retarder worn/broken/malfunction	54	---	---	---	---	---	---
174	Spring/power switch mech. malfunction	9	---	---	---	---	---	---
175	Retarder yard skate defective	5	---	---	---	---	---	---
176	Switch out of adjust. (insuf rail anch)	13	---	---	---	---	---	---
179	Other frog/switches/track appl. causes	92	---	---	---	---	---	---
	SUBTOTAL.....	878	---	---	---	---	---	---
OTHER WAY AND STRUCTURE								
180	Bridge misalignment or failure	3	---	---	---	---	---	---
181	Flangeway clogged	12	---	---	---	---	---	---
189	Other way and structure causes	9	---	---	---	---	---	---
	SUBTOTAL.....	24	---	---	---	---	---	---
SIGNAL AND COMMUNICATION FAILURES								
200	Fix sig. improperly displayed (defect)	3	---	---	---	---	---	---
201	Radio communication equipment failure	6	---	---	---	---	---	---
202	Other communication equipment failure	1	---	---	---	---	---	---
209	Signal & communication failure N.O.C.	1	---	---	---	---	---	---
	SUBTOTAL.....	11	---	---	---	---	---	---
GRAND TOTAL.....								
		4337	1	---	1	---	---	1

TABLE 104-B NONFATAL CASUALTIES IN ACCIDENTS RESULTING FROM TRACK ROADBED AND STRUCTURES BY SPECIFIC CAUSE
CLASS I AND CLASS II RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty	Other	Total	Emp not on duty	Passen- gers	Non tres- passers	Tres- passers	Total Injured
ROADBED DEFECTS										
101	Roadbed settled or soft	114	6	---	6	---	---	---	---	6
102	Washout/rain/slide/ice,etc. dmg to trk	53	11	---	11	---	---	---	---	11
109	Other roadbed defects	56	9	---	9	---	---	---	---	9
	SUBTOTAL.....	223	26	---	26	---	---	---	---	26
TRACK GEOMETRY DEFECTS										
110	Wide gage (defect/missing crossties)	747	8	2	10	---	---	---	---	10
111	Wide gage (def/missing rail fasteners)	97	3	---	3	---	---	---	---	3
112	Wide gage (involving gage rods)	18	---	---	---	---	---	---	---	---
113	Wide gage due to worn rail	94	---	---	---	---	---	---	---	---
114	Track alignment irregular	97	3	---	3	---	---	---	---	3
115	Track alignment irregular (buckled)	103	16	---	16	---	---	---	---	16
116	Track profile improper	13	---	---	---	---	---	---	---	---
117	Superelevation incorrect	56	1	---	1	---	---	---	---	1
119	Cross level irregular at joints	409	4	1	5	---	---	---	---	5
120	Cross level irregular not at joints	270	7	---	7	---	---	---	---	7
129	Other track geometry defects	78	6	5	11	---	3	---	---	14
	SUBTOTAL.....	1982	48	8	56	---	3	---	---	59
RAIL AND JOINT BAR DEFECTS										
130	Bolt hole crack or break	76	3	---	3	---	---	---	---	3
131	Broken base of rail	242	7	---	7	---	---	---	---	7
132	Broken weld, field	12	---	---	---	---	---	---	---	---
133	Broken weld, plant	3	---	---	---	---	---	---	---	---
134	Detail fracture fm shelling/head check	15	2	---	2	---	---	---	---	2
135	Engine burn fracture	3	---	---	---	---	---	---	---	---
136	Head/web sep.(outside joint bar limit)	114	5	---	5	---	---	---	---	5
137	Head/web sep.(within joint bar limits)	60	---	---	---	---	---	---	---	---
138	Horizontal split head	26	---	---	---	---	---	---	---	---
139	Piped rail	2	---	---	---	---	---	---	---	---
140	Rail defect with joint bar repair	8	---	---	---	---	---	---	---	---
141	Transverse/compound fissure	160	7	---	7	---	---	---	---	7
142	Vertical split head	134	9	---	9	---	---	---	---	9
143	Worn rail	97	2	---	2	---	---	---	---	2
144	Mismatched rail-head contour	22	---	---	---	---	---	---	---	---
145	Joint bar broken, compromise	4	---	---	---	---	---	---	---	---
146	Joint bar broken, insulated	6	---	---	---	---	---	---	---	---
147	Joint bar broken, noninsulated	77	1	---	1	---	---	---	---	1
148	Joint bolts, broken or missing	31	1	---	1	---	---	---	---	1
149	Other rail and joint bar defects	127	19	---	19	---	---	---	---	19
	SUBTOTAL.....	1219	56	---	56	---	---	---	---	56
FROGS, SWITCHES AND TRACK APPLIANCES										
160	Guard rail loose/broken/etc.	24	---	---	---	---	---	---	---	---
161	Switch damaged/out of adjustment	135	2	---	2	---	---	---	---	2
162	Switch stand failure (hand oper.)	30	---	---	---	---	---	---	---	---
163	Switch connecting/oper. rod fail.	18	---	---	---	---	---	---	---	---
164	Stock rail worn/broken/disconnect	13	1	---	1	---	---	---	---	1
165	Switch point worn or broken	434	2	---	2	---	---	---	---	2
166	Switch rod worn/bent/broken/etc.	10	---	---	---	---	---	---	---	---
167	Frog, rigid, worn or broken	18	1	---	1	---	---	---	---	1
168	Frog, spring, worn or broken	10	---	---	---	1	---	---	---	1
169	Frog, self guarded, worn/broken	9	---	---	---	---	---	---	---	---
171	Derail, defective	4	---	---	---	---	---	---	---	---
173	Retarder worn/broken/malfunction	54	---	---	---	---	---	---	---	---
174	Spring/power switch mech. malfunction	9	---	---	---	---	---	---	---	---
175	Retarder yard skate defective	5	---	---	---	---	---	---	---	---
176	Switch out of adjust.(insuf rail anch)	13	---	---	---	---	---	---	---	---
179	Other frog/switches/track appl. causes	92	1	---	1	---	---	---	---	1
	SUBTOTAL.....	878	6	1	7	---	1	---	---	8
OTHER WAY AND STRUCTURE										
180	Bridge misalignment or failure	3	2	---	2	---	---	---	---	2
181	Flangeway clogged	12	3	---	3	---	---	---	---	3
189	Other way and structure causes	9	---	---	---	---	---	---	---	---
	SUBTOTAL.....	24	5	---	5	---	---	---	---	5
SIGNAL AND COMMUNICATION FAILURES										
200	Fix sig. improperly displayed (defect)	3	---	---	---	---	---	---	---	---
201	Radio communication equipment failure	6	2	---	2	---	---	---	---	2
202	Other communication equipment failure	1	---	---	---	---	---	---	---	---
209	Signal & communication failure N.O.C.	1	---	---	---	---	---	---	---	---
	SUBTOTAL.....	11	2	---	2	---	---	---	---	2
GRAND TOTAL.....		4337	143	9	152	---	4	---	---	156

TABLE 104-C NUMBER OF ACCIDENTS RESULTING FROM TRACK, ROADBED AND STRUCTURES BY SPECIFIC CAUSE, 1977
CLASS I AND CLASS II RAILROADS

Cause No.	Causes	Collis- ions	Derail- ments	Other	Total
ROADBED DEFECTS					
101	Roadbed settled or soft	---	114	---	114
102	Washout/rain/slide/flood/snow/ice damage to track	1	51	1	53
109	Other roadbed defects (cause code not listed)	---	56	---	56
SUBTOTAL.....		1	221	1	223
TRACK GEOMETRY DEFECTS					
110	Wide gage (defective or missing crossties)	2	745	---	747
111	Wide gage (defective or missing spikes or other rail fasteners)	1	96	---	97
112	Wide gage (loose, broken, or defective gage rods)	---	18	---	18
113	Wide gage (worn rail)	1	93	---	94
114	Track alignment irregular	---	97	---	97
115	Track alignment irregular (buckled)	---	102	1	103
116	Track profile improper	---	13	---	13
117	Superelevation improper, excessive or insufficient	---	56	---	56
119	Cross level of track irregular (at joints)	3	405	1	409
120	Cross level of track irregular (not at joints)	2	268	---	270
129	Other track geometry defects (cause code not listed)	---	78	---	78
SUBTOTAL.....		9	1,971	2	1,982
RAIL AND JOINT BAR DEFECTS					
130	Bolt hole crack or break	1	75	---	76
131	Broken base of rail	---	242	---	242
132	Broken weld, field	---	12	---	12
133	Broken weld, plant	---	3	---	3
134	Detail fracture from shelling or head check	1	14	---	15
135	Engine burn fracture	---	3	---	3
136	Head and web separation (outside joint bar limits)	1	113	---	114
137	Head and web separation (within joint bar limits)	1	59	---	60
138	Horizontal split head	---	26	---	26
139	Piped rail	---	2	---	2
140	Rail defect with joint bar repair	---	8	---	8
141	Transverse/compound fissure	1	159	---	160
142	Vertical split head	1	133	---	134
143	Worn rail	---	97	---	97
144	Mismatched rail-head contour	---	21	1	22
145	Joint bar broken, compromise	---	4	---	4
146	Joint bar broken, insulated	---	6	---	6
147	Joint bar broken, noninsulated	---	77	---	77
148	Joint bolts, broken or missing	---	31	---	31
149	Other rail and joint bar defects (cause code not listed)	2	125	---	127
SUBTOTAL.....		8	1,210	1	1,219
FROGS, SWITCHES AND TRACK APPLIANCES					
160	Guard rail loose/broken, or mislocated	---	24	---	24
161	Switch damaged or out of adjustment	4	130	1	135
162	Switch, hand operated, stand mechanism broken, loose or worn	1	29	---	30
163	Switch connecting or operating rod, broken or defective	---	18	---	18
164	Stock rail worn, broken or disconnected	---	13	---	13
165	Switch point worn or broken	1	433	---	434
166	Switch rod worn, bent, broken or disconnected	---	10	---	10
167	Frog, rigid, worn or broken	---	18	---	18
168	Frog, spring, worn or broken	---	10	---	10
169	Frog, self guarded, worn or broken	---	9	---	9
171	Derail, defective	2	2	---	4
173	Retarder worn, broken or malfunctioning	23	16	15	54
174	Spring/power switch mechanism malfunction	---	9	---	9
175	Retarder yard skate defective	4	1	---	5
176	Switch out of adjustment due to insufficient rail anchoring	---	13	---	13
179	Other frog, switch or track appliance causes	10	82	---	92
SUBTOTAL.....		45	817	16	878
OTHER WAY AND STRUCTURE					
180	Bridge misalignment or failure	---	3	---	3
181	Flangeway clogged	1	11	---	12
189	Other way and structure (cause code not listed)	1	3	5	9
SUBTOTAL.....		2	17	5	24
SIGNAL AND COMMUNICATION FAILURES					
200	Fixed signal improperly displayed (defective)	1	2	---	3
201	Radio communication equipment failure	4	1	1	6
202	Other communication equipment failure	1	---	---	1
209	Signal and communication failure (cause code not listed)	1	---	---	1
SUBTOTAL.....		7	3	1	11
GRAND TOTAL.....		72	4,239	26	4,337

TABLE 104-D FATALITIES IN ACCIDENTS RESULTING FROM TRACK, ROADBED AND STRUCTURES BY SPECIFIC CAUSE
RAPID TRANSIT RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty.... Trainmen	Other	Total	Emp not on duty	Passen- gers	Non tres- passers	Tres- passers	Total Killed
FROGS, SWITCHES AND TRACK APPLIANCES										
165	Switch point worn or broken	3	---	---	---	---	---	---	---	---
174	Spring/power switch mech. malfunction	2	---	---	---	---	---	---	---	---
179	Other frog/switches/track appl. causes	1	---	---	---	---	---	---	---	---
	SUBTOTAL.....	6	---	---	---	---	---	---	---	---
SIGNAL AND COMMUNICATION FAILURES										
209	Signal & communication failure N.O.C.	1	---	---	---	---	---	---	---	---
	SUBTOTAL.....	1	---	---	---	---	---	---	---	---
	GRAND TOTAL.....	7	---	---	---	---	---	---	---	---

TABLE 104-E NONFATAL CASUALTIES IN ACCIDENTS RESULTING FROM TRACK ROADBED AND STRUCTURES BY SPECIFIC CAUSE
RAPID TRANSIT RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty.... Trainmen	Other	Total	Emp not on duty	Passen- gers	Non tres- passers	Tres- passers	Total Injured
FROGS, SWITCHES AND TRACK APPLIANCES										
165	Switch point worn or broken	3	---	---	---	---	---	---	---	---
174	Spring/power switch mech. malfunction	2	---	---	---	---	---	---	---	---
179	Other frog/switches/track appl. causes	1	---	---	---	---	---	---	---	---
	SUBTOTAL.....	6	---	---	---	---	---	---	---	---
SIGNAL AND COMMUNICATION FAILURES										
209	Signal & communication failure N.O.C.	1	3	---	3	---	1	---	---	4
	SUBTOTAL.....	1	3	---	3	---	1	---	---	4
	GRAND TOTAL.....	7	3	---	3	---	1	---	---	4

TABLE 104-F NUMBER OF ACCIDENTS RESULTING FROM TRACK, ROADBED AND STRUCTURES BY SPECIFIC CAUSE, 1977
RAPID TRANSIT RAILROADS

Cause No.	Causes	Collisions	Derailements	Other	Total
COUPLER AND DRAFT SYSTEM					
165	Switch point worn or broken	---	3	---	3
174	Spring/power switch mechanism malfunction	---	2	---	2
179	Other frog, switch or track appliance causes	---	1	---	1
SUBTOTAL.....		---	6	---	6
AXLES AND JOURNAL BEARINGS					
209	Signal and communication failure (cause code not listed)	1	---	---	1
SUBTOTAL.....		1	---	---	1
GRAND TOTAL.....		1	6	---	7

TABLE 105-A FATALITIES IN ACCIDENTS RESULTING FROM MISCELLANEOUS CAUSES BY SPECIFIC CAUSE CLASS I AND CLASS II RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty..... Trainmen	Other	Emp not on duty Total	Passengers	Non trespassers	Trespassers	Total Killed
MISC CAUSES NOT OTHERWISE LISTED									
700	Collision with hwy user at grade xing	320	6	2	8	---	81	4	93
701	Emergency brk appl to avoid accident	9	---	---	---	---	---	---	---
702	Vandalism	150	---	---	---	---	---	---	---
703	Interference with RR oper.--not vandals	54	---	---	---	---	---	---	---
704	Load shifted	103	1	---	1	---	---	---	1
705	Load fell from car	32	---	---	---	---	---	---	---
706	Overloaded car	25	---	---	---	---	---	---	---
707	Improperly loaded car	45	---	---	---	---	---	---	---
708	Oversized load, misrouted	12	---	---	---	---	---	---	---
709	Object on or fouling track	82	1	---	1	---	---	---	1
710	Equipment on or fouling track	39	---	---	---	---	---	---	---
711	Trail/contain tiedown egp-impr applied	9	---	---	---	---	---	---	---
712	Overload/improper loaded container etc	3	---	---	---	---	---	---	---
713	Interaction of lateral/vertical forces	90	---	---	---	---	---	---	---
714	Failure to control spd with hand brake	7	---	---	---	---	---	---	---
715	Snow, ice, or mud on track	40	---	---	---	---	---	---	---
716	Other acts of God	18	---	---	---	---	---	---	---
799	Other miscellaneous causes	364	2	---	2	---	1	2	5
SUBTOTAL.....		1402	10	2	12	---	82	6	100
GRAND TOTAL.....		1402	10	2	12	---	82	6	100

TABLE 105-B NONFATAL CASUALTIES IN ACCIDENTS RESULTING FROM MISCELLANEOUS CAUSES BY SPECIFIC CAUSE CLASS I AND CLASS II RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty..... Trainmen	Other	Emp not on duty Total	Passengers	Non trespassers	Trespassers	Total Injured
MISC CAUSES NOT OTHERWISE LISTED									
700	Collision with hwy user at grade xing	320	84	14	98	25	153	14	290
701	Emergency brk appl to avoid accident	9	1	---	1	---	1	---	2
702	Vandalism	150	26	---	26	---	---	1	27
703	Interference with RR oper.--not vandals	54	8	---	8	3	6	1	18
704	Load shifted	103	9	---	9	---	---	1	10
705	Load fell from car	32	2	---	2	---	---	---	2
706	Overloaded car	25	---	---	---	---	---	---	---
707	Improperly loaded car	45	4	---	4	---	---	---	4
708	Oversized load, misrouted	12	---	---	---	---	---	---	---
709	Object on or fouling track	82	10	1	11	7	---	---	18
710	Equipment on or fouling track	39	9	9	18	2	1	---	21
711	Trail/contain tiedown egp-impr applied	9	---	---	---	---	---	---	---
712	Overload/improper loaded container etc	3	---	---	---	---	---	---	3
713	Interaction of lateral/vertical forces	90	3	---	3	---	---	---	3
714	Failure to control spd with hand brake	7	---	---	---	---	---	---	---
715	Snow, ice, or mud on track	40	6	---	6	---	---	---	6
716	Other acts of God	18	2	1	3	---	---	---	3
799	Other miscellaneous causes	364	20	10	30	13	9	2	54
SUBTOTAL.....		1402	184	35	219	50	170	19	458
GRAND TOTAL.....		1402	184	35	219	50	170	19	458

TABLE 105-C NUMBER OF ACCIDENTS RESULTING FROM MISCELLANEOUS CAUSES BY SPECIFIC CAUSE, 1977
CLASS I AND CLASS II RAILROADS

Cause No.	Causes	Collis- ions	Derail- ments	Other	Total
MISC CAUSES NOT OTHERWISE LISTED					
700	Collision with highway user at grade crossing	---	---	320	320
701	Emergency brake application to avoid accident	---	7	2	9
702	Vandalism	13	86	51	150
703	Interference with R.R. operations by nonrailroad employees (not vandalism)	12	33	9	54
704	Load shifted	12	85	6	103
705	Load fell from car	3	19	10	32
706	Overloaded car	---	23	2	25
707	Improperly loaded car	1	43	1	45
708	Oversized load, misrouted	3	2	7	12
709	Object on or fouling track	2	59	21	82
710	Equipment on or fouling track	22	9	8	39
711	Trailer or container tiedown equipment improperly applied	2	2	5	9
712	Overloaded or improperly loaded container or trailer on flat car	1	1	1	3
713	Interaction of lateral/vertical forces	---	90	---	90
714	Failure to control speed of car using hand brake (non-railroad employee)	3	4	---	7
715	Snow, ice, or mud on track	3	37	---	40
716	Other acts of God	4	8	6	18
799	Miscellaneous causes not otherwise listed	43	197	124	364
SUBTOTAL.....		124	705	573	1,402
GRAND TOTAL.....		124	705	573	1,402

TABLE 105-D FATALITIES IN ACCIDENTS RESULTING FROM MISCELLANEOUS CAUSES BY SPECIFIC CAUSE RAPID TRANSIT RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty.... Trainmen Other	Emp not on duty	Passen- gers	Non tres- passers	Tres- passers	Total Killed
MISC CAUSES NOT OTHERWISE LISTED								
700	Collision with hwy user at grade xing	1	---	---	---	---	---	---
709	Object on or fouling track	2	---	---	---	---	---	---
799	Other miscellaneous causes	9	---	---	---	---	---	---
SUBTOTAL.....		12	---	---	---	---	---	---
GRAND TOTAL.....		12	---	---	---	---	---	---

TABLE 105-E NONFATAL CASUALTIES IN ACCIDENTS RESULTING FROM MISCELLANEOUS CAUSES BY SPECIFIC CAUSE RAPID TRANSIT RAILROADS, 1977

Cause No.	Causes	Total Accidents	Employees on duty.... Trainmen Other	Emp not on duty	Passen- gers	Non tres- passers	Tres- passers	Total Injured
MISC CAUSES NOT OTHERWISE LISTED								
700	Collision with hwy user at grade xing	1	---	---	---	---	---	---
709	Object on or fouling track	2	---	---	---	---	---	---
799	Other miscellaneous causes	9	2	7	9	---	3	12
SUBTOTAL.....		12	2	7	9	---	3	12
GRAND TOTAL.....		12	2	7	9	---	3	12

TABLE 105-F NUMBER OF ACCIDENTS RESULTING FROM MISCELLANEOUS CAUSES BY SPECIFIC CAUSE, 1977
RAPID TRANSIT RAILROADS

Cause No.	Causes	Collis- ions	Derail- ments	Other	Total
MISC CAUSES NOT OTHERWISE LISTED					
700	Collision with highway user at grade crossing	---	---	1	1
709	Object on or fouling track	---	1	1	2
799	Miscellaneous causes not otherwise listed	2	4	3	9
SUBTOTAL.....		2	5	5	12
GRAND TOTAL.....		2	5	5	12

TABLE 106-A TRAIN INCIDENTS RESULTING IN FATALITIES TO EMPLOYEES ON DUTY
BY SPECIFIC OCCURRENCE AND CLASS OF EMPLOYEE
CLASS I AND II RAILROADS, 1977

Occurrence No.	Occurrences	Yard Service		Freight		Passenger		Other Trainmen	Other Employees	Total Employees
		Conductors Foremen	Brakemen Helpers	Conductors	Brakemen Flagmen	Conductors	Brakemen Flagmen			
COUPLING/UNCOUPLING LOCOMOTIVES OR CARS										
001T	Adjusting coupler, equipment moving unexpectedly.....	2	1	---	---	---	---	---	---	3
007T	Striking parts of body against equipment - equipment moving.....	---	2	---	---	---	---	---	---	2
008T	Stumbled,slipped,fell,etc. on foreign obj/irreg surface-eqp moving.....	---	---	---	1	---	---	---	---	1
009T	Other acc/inc while coupling/uncoupling cars or locos - equip moving.....	---	1	---	2	---	---	---	---	3
	SUBTOTAL.....	2	4	---	3	---	---	---	---	9
OPERATING HAND BRAKES										
205T	Caught between parts of equipment or lading - equipment moving.....	---	---	---	1	---	---	---	---	1
207T	Losing hold, slipping, or falling - equipment moving.....	---	---	1	---	---	---	---	---	1
209T	Other accidents/incidents while operating hand brakes - eqp moving.....	---	---	---	1	---	---	---	---	1
	SUBTOTAL.....	---	---	1	2	---	---	---	---	3
	GRAND TOTAL.....	2	4	1	5	---	---	---	---	12

NOTE: Bag = Baggage-men For = Foremen Non = Nontrespassers
 Brk = Brakemen Hlp = Helpers Oth = Others
 Cnd = Conductors Fmn = Firemen Pas = Passengers
 Eng = Engineers Hos = Hostlers Trn = Trainmen
 Flg = Flagmen Mtr = Motormen Trs = Trespassers

TABLE 106-B TRAIN INCIDENTS RESULTING IN INJURIES TO EMPLOYEES ON DUTY
BY SPECIFIC OCCURRENCE AND CLASS OF EMPLOYEE
CLASS I AND II RAILROADS, 1977

Occurrence No.	Occurrences	Yard Service		Road Service		Passenger		Other Trainmen	Other Employees	Total Employees
		Conductors Foremen	Brakemen Helpers	Freight Conductors	Brakemen Flagmen	Conductors	Brakemen Flagmen			
COUPLING/UNCOUPLING LOCOMOTIVES OR CARS										
001T	Adjusting coupler, equipment moving unexpectedly.....	10	15	---	11	---	---	1	2	39
002T	Adjusting coupler - equipment moving.....	6	30	2	10	---	1	2	1	52
004T	Adjusting coupler, part of coupler fell striking person - eqp moving.....	1	2	---	2	---	---	---	---	5
005T	Use of uncoupling lever - equipment moving.....	21	84	6	15	---	1	1	1	129
006T	Use of uncoupling lever - equipment moving unexpectedly.....	2	5	1	3	---	---	1	---	12
007T	Striking parts of body against equipment - equipment moving.....	16	47	9	21	1	---	8	1	103
008T	Stumbled, slipped, fell, etc. on foreign obj/irreg surface-eqp moving.....	24	72	7	22	---	1	1	---	127
009T	Other acc/inc while coupling/uncoupling cars or locos - equip moving.....	19	74	3	26	---	2	9	8	141
SUBTOTAL.....		99	329	28	110	1	5	23	13	608
COUPLING/UNCOUPLING AIR/STEAM HOSES AND SAFETY CHAINS										
052T	Uncoupl air hose, struck by hose due to sudden release of air-eqp mov.....	2	12	5	13	---	1	1	1	35
053T	Coupling air hose, stk by hose due to sudden release of air - eqp mov.....	---	3	---	2	---	---	---	---	5
054T	Stumbled, slipped, fell, or stepped on foreign obj, etc., eqp moving.....	3	6	---	3	---	---	---	2	14
055T	Defective equipment - equipment moving.....	---	3	---	---	---	1	---	---	4
057T	Opening or closing angle cocks - equipment moving.....	3	13	4	7	---	---	1	1	29
059T	Oth A/I while coupl/uncoupl air/steam hose or turn angl cock-eqp mov.....	2	23	8	18	---	---	---	3	54
SUBTOTAL.....		10	60	17	43	---	1	3	7	141
OPERATING HAND BRAKES										
201T	Defective equipment - equipment moving.....	3	6	---	6	---	---	---	1	16
202T	Pawl slipping or accidentally knocked out of ratchet - eqp moving.....	1	7	---	2	---	---	---	---	10
203T	Striking body due to movement of equipment.....	1	37	4	23	1	---	---	1	67
205T	Caught between parts of equipment or lading - equipment moving.....	2	10	1	1	---	---	---	4	18
206T	Brake chains or bolts, breaking or giving way - equipment moving.....	---	2	---	---	---	---	---	---	2
207T	Losing hold, slipping, or falling - equipment moving.....	5	36	5	24	---	---	---	2	72
208T	Caught hand or fingers in spinning brake wheel - equipment moving.....	---	4	1	1	---	---	---	1	7
209T	Other accidents/incidents while operating hand brakes - eqp moving.....	9	65	10	28	---	---	---	4	116
SUBTOTAL.....		21	167	21	85	1	---	---	13	308
OPERATING SWITCHES										
304T	Struck by moving on-track equipment.....	4	14	1	7	---	---	1	1	28
309T	Other accidents/incidents while operating switches - equipment mov.....	8	38	4	20	---	---	5	2	77
SUBTOTAL.....		12	52	5	27	---	---	6	3	105
GRAND TOTAL.....		142	608	71	265	2	6	32	36	1162

NOTE: Bag = Baggage men For = Foremen Non = Nontresspassers
Brk = Brakemen Hlp = Helpers Oth = Others
Cnd = Conductors Fmn = Firemen Pas = Passengers
Eng = Engineers Hos = Hostlers Trn = Trainmen
Flg = Flagmen Mtr = Motormen Trs = Trespassers

TABLE 106-D TRAIN INCIDENTS RESULTING IN INJURIES TO EMPLOYEES ON DUTY
BY SPECIFIC OCCURRENCE AND CLASS OF EMPLOYEE
RAPID TRANSIT CARRIERS, 1977

Occurrence No.	Occurrences	Yard Service		Road Service				Other Trainmen	Other Employees	Total Employees
		Conductors Foremen	Brakemen Helpers	Freight Conductors	Brakemen Flagmen	Passenger Conductors	Brakemen Flagmen			
COUPLING/UNCOUPLING LOCOMOTIVES OR CARS										
009T	Other acc/inc while coupling/uncoupling cars or locos - equip moving.....	---	1	---	---	---	---	---	---	1
	SUBTOTAL.....	---	1	---	---	---	---	---	---	1
OPERATING SWITCHES										
304T	Struck by moving on-track equipment.....	---	---	---	---	---	---	---	2	2
	SUBTOTAL.....	---	---	---	---	---	---	---	2	2
	GRAND TOTAL.....	---	1	---	---	---	---	---	2	3

TABLE 106-E TRAIN INCIDENTS RESULTING IN NON-FATAL ILLNESSES TO EMPLOYEES ON DUTY
BY SPECIFIC CAUSE AND CLASS OF EMPLOYEE
CLASS I AND II RAILROADS, 1977

Occurrence No.	Occurrences	Yard Service		Road Service				Other Trainmen	Other Employees	Total Employees
		Conductors Foremen	Brakemen Helpers	Freight Conductors	Brakemen Flagmen	Passenger Conductors	Brakemen Flagmen			
COUPLING/UNCOUPLING LOCOMOTIVES OR CARS										
009T	Other acc/inc while coupling/uncoupling cars or locos - equip moving.....	---	1	---	---	---	---	---	---	1
	SUBTOTAL.....	---	1	---	---	---	---	---	---	1
OPERATING HAND BRAKES										
209T	Other accidents/incidents while operating hand brakes - eqp moving.....	---	1	---	---	---	---	---	---	1
	SUBTOTAL.....	---	1	---	---	---	---	---	---	1
OPERATING SWITCHES										
309T	Other accidents/incidents while operating switches - equipment mov.....	---	1	---	1	---	---	---	---	2
	SUBTOTAL.....	---	1	---	1	---	---	---	---	2
	GRAND TOTAL.....	---	3	---	1	---	---	---	---	4

NOTE: Bag = Baggage men For = Foremen Non = Non trespassers
Brk = Brakemen Hlp = Helpers Oth = Others
Cnd = Conductors Fm = Firemen Pas = Passengers
Eng = Engineers Hos = Hostlers Trn = Trainmen
Flg = Flagmen Mtr = Motormen Trs = Trespassers

TABLE 107-B TRAIN INCIDENTS RESULTING IN INJURIES TO EMPLOYEES ON DUTY
WHILE OPERATING LOCOMOTIVES OR RAIL MOTORCARS BY SPECIFIC OCCURRENCE
CLASS I AND II RAILROADS, 1977

Occurrence No.	Occurrences	Yard Service		Freight		Road Service		Other Trainmen	Other Employees	Total Employees On Duty
		Engineers	Firemen	Engineers	Firemen	Engineers	Firemen			
		+ Motormen	+ Helpers	+ Motormen	+ Helpers	+ Motormen	+ Helpers			
OPERATING LOCOMOTIVES										
101T	Burn or electrical shock - equipment moving.....	---	---	5	1	---	1	---	---	7
102T	Striking parts of body against equipment, moving about loco-eqp mov.....	16	3	19	3	1	2	13	2	59
103T	Struck by tools or other objects falling - equipment moving..	4	1	5	1	---	---	2	---	13
104T	Stumbled, slipped, fell, stepped on foreign obj, etc., - eqp moving.....	1	---	2	---	---	---	11	2	16
105T	Checking, oiling, servicing locomotive, etc. - equipment moving.....	---	---	2	5	---	2	---	1	11
106T	Unexpected movement of locomotive, other than slack action...	49	6	20	4	3	---	19	10	111
107T	Slack action in locomotive.....	9	1	13	4	---	---	13	1	41
108T	Striking parts of body against equipment due to sudden stop of loco.....	32	4	20	2	1	2	23	7	91
109T	Inhalation of or contact with fumes or gases - equipment moving.....	1	1	---	---	---	---	2	1	5
110T	Defective locomotive seat - equipment moving.....	6	4	5	---	1	1	---	---	17
111T	Adjusting locomotive seat - equipment moving.....	4	---	7	1	---	---	---	1	13
112T	Foreign object in eye - equipment moving.....	116	16	124	25	9	4	61	6	361
119T	Other accidents/incidents while operating locomotives - eqp moving.....	37	4	39	6	4	2	18	4	114
SUBTOTAL.....		275	40	261	52	19	14	163	35	859
OPERATING RAIL MOTORCARS										
151T	Striking parts of body against equipment - equipment moving..	---	---	---	---	---	---	2	7	9
152T	Struck by tools or other objects falling - equipment moving..	---	---	---	---	---	---	---	1	1
153T	Stumbled, slipped, fell or stepped on foreign obj, etc., - eqp mov.....	---	---	---	---	---	---	1	5	6
154T	Unexpected movement of rail motorcar.....	---	---	---	---	---	---	1	14	15
159T	Other accidents/incidents while operating rail motorcars - eqp mov.....	---	---	---	---	---	---	---	41	41
SUBTOTAL.....		---	---	---	---	---	---	4	68	72
GRAND TOTAL.....		275	40	261	52	19	14	167	103	931

TABLE 107-D TRAIN INCIDENTS RESULTING IN INJURIES TO EMPLOYEES ON DUTY
WHILE OPERATING LOCOMOTIVES OR RAIL MOTORCARS BY SPECIFIC OCCURRENCE
RAPID TRANSIT CARRIERS, 1977

Occurrence No.	Occurrences	Yard Service.....		Freight.....		Road Service.....		Other Trainmen	Other Employees	Total Employees On Duty
		Engineers	Firemen	Engineers	Firemen	Engineers	Firemen			
		+ Motormen	+ Helpers	+ Motormen	+ Helpers	+ Motormen	+ Helpers			
OPERATING LOCOMOTIVES										
102T	Striking parts of body against equipment, moving about loco-eqp mov.....	---	---	---	---	---	---	1	---	1
103T	Struck by tools or other objects falling - equipment moving..	---	---	---	---	3	---	---	---	3
108T	Striking parts of body against equipment due to sudden stop of loco.....	---	---	---	---	2	---	---	---	2
110T	Defective locomotive seat - equipment moving.....	---	---	---	---	3	---	---	---	3
111T	Adjusting locomotive seat - equipment moving.....	---	---	---	---	1	---	---	---	1
112T	Foreign object in eye - equipment moving.....	---	---	---	---	6	---	---	---	6
SUBTOTAL.....		---	---	---	---	15	---	1	---	16
OPERATING RAIL MOTORCARS										
151T	Striking parts of body against equipment - equipment moving..	---	---	---	---	5	---	---	---	5
152T	Struck by tools or other objects falling - equipment moving..	---	---	---	---	1	---	---	---	1
153T	Stumbled, slipped, fell or stepped on foreign obj, etc., - eqp mov.....	---	---	---	---	---	---	1	---	1
154T	Unexpected movement of rail motorcar.....	---	---	---	---	1	---	---	---	1
159T	Other accidents/incidents while operating rail motorcars - eqp mov.....	---	---	---	---	3	---	---	---	3
SUBTOTAL.....		---	---	---	---	10	---	1	---	11
GRAND TOTAL.....		---	---	---	---	25	---	2	---	27

NOTE: Bag = Baggage men For = Foremen Non = Nonrespassengers
Brk = Brakemen Hlp = Helpers Oth = Others
Cnd = Conductors Fm = Firemen Pas = Passengers
Eng = Engineers Hos = Hostlers Trn = Trainmen
Flg = Flagmen Mtr = Motormen Trs = Trespassers

TABLE 107-E NONFATAL ILLNESSES TO EMPLOYEES ON DUTY WHILE OPERATING LOCOMOTIVES
OR RAIL MOTORCARS BY SPECIFIC OCCURRENCE, CLASS I AND II RAILROADS, 1977

Occurrence No.	Occurrences	..Yard Service...		Road Service.....		Other Trainmen	Other Employees	Total Employees On Duty		
		Engineers	Firemen	Engineers	Firemen				Engineers	Firemen
		+ Motormen	+ Helpers	+ Motormen	+ Helpers				+ Motormen	+ Helpers

OPERATING LOCOMOTIVES										
101T	Burn or electrical shock - equipment moving.....	---	---	---	---	---	1	---	---	1
109T	Inhalation of or contact with fumes or gases - equipment moving.....	10	1	16	5	6	3	6	1	48
112T	Foreign object in eye - equipment moving.....	---	---	1	---	---	---	---	---	1
119T	Other accidents/incidents while operating locomotives - eqp moving.....	2	1	3	---	---	---	---	---	6
	SUBTOTAL.....	12	2	20	5	6	4	6	1	56
OPERATING RAIL MOTORCARS										
159T	Other accidents/incidents while operating rail motorcars - eqp mov.....	---	---	---	---	---	---	---	1	1
	SUBTOTAL.....	---	---	---	---	---	---	---	1	1
	GRAND TOTAL.....	12	2	20	5	6	4	6	2	57

TABLE 107-F NONFATAL ILLNESSES TO EMPLOYEES ON DUTY WHILE OPERATING LOCOMOTIVES
OR RAIL MOTORCARS BY SPECIFIC OCCURRENCE, RAPID TRANSIT CARRIERS, 1977

Occurrence No.	Occurrences	...Yard Service....		Freight.....		Road Service.....		Passenger.....		Other Trainmen	Other Employees	Total Employees On Duty
		Engineers	Firemen	Engineers	Firemen	Engineers	Firemen	Engineers	Firemen			
		+ Motormen	+ Helpers	+ Motormen	+ Helpers	+ Motormen	+ Helpers	+ Motormen	+ Helpers			

	OPERATING LOCOMOTIVES											
109T	Inhalation of or contact with fumes or gases - equipment moving.....	---	---	---	---	1	---	---	7			8
	SUBTOTAL.....	---	---	---	---	1	---	---	7			8
	OPERATING RAIL MOTORCARS											
159T	Other accidents/incidents while operating rail motorcars - eqp mov.....	---	---	---	---	2	---	---	---			2
	SUBTOTAL.....	---	---	---	---	2	---	---	---			2
	GRAND TOTAL.....	---	---	---	---	3	---	---	7			10

NOTE: Bag = Baggage men For = Foremen Non = Nontresspassers
Brk = Brakemen Hlp = Helpers Oth = Others
Cnd = Conductors Fmn = Firemen Pas = Passengers
Eng = Engineers Hos = Hostlers Trn = Trainmen
Flg = Flagmen Mtr = Motormen Trs = Trespassers

TABLE 108-A FATALITIES IN TRAIN INCIDENTS TO PERSONS ON LOCOMOTIVES OR CARS CONTACTING FIXED STRUCTURES
BY SPECIFIC OCCURENCE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

Occurrence No.	Occurences	E m p l o y e e s o n D u t y															Employees not on duty		Other Persons			Total Killed all Classes		
		Yard Service				Freight				Road Service				Passenger			Trn	Oth	Pas	Non	Trs			
		Eng	Fmn	Cnd	Brk	Eng	Fmn	Cnd	Brk	Eng	Fmn	Cnd	Brk	Bag	Flg	Hos							All Oth	Tot
		Mtr	Hlp	For	Hlp	Mtr	Hlp	Cnd	Flg	Mtr	Hlp	Cnd	Flg											
401T	Persons on top locos/cars contacting fixed objects - equipment mov.....	---	---	1	---	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	---	1		
402T	Persons on side/end of locos/cars contacting fixed objects - eqp mov.....	---	---	3	---	---	---	---	---	---	---	---	---	---	---	1	4	---	---	---	---	4		
409T	Persons on loco/car coming in contact with fixed obj(other)-eqp mov.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	1		
GRAND TOTAL		---	---	4	---	---	---	---	---	---	---	---	---	---	---	1	5	---	---	---	---	1	6	

TABLE 108-B INJURIES IN TRAIN INCIDENTS TO PERSONS ON LOCOMOTIVES OR CARS CONTACTING FIXED STRUCTURES
BY SPECIFIC OCCURENCE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

Occurrence No.	Occurences	E m p l o y e e s o n D u t y															Employees not on duty		Other Persons		Total Injuries All Classes	
		Yard Service				Freight				Road Service				Passenger		Trn	Oth	Pas	Non	Trs		
		Eng	Fmn	Cnd	Brk	Eng	Fmn	Cnd	Brk	Eng	Fmn	Cnd	Brk	Hos	All Oth							Tot
		Mtr	Hlp	For	Hlp	Mtr	Hlp	Cnd	Flg	Mtr	Hlp	Cnd	Bag									
401T	Persons on top locos/cars contacting fixed objects - equipment mov.....	---	---	5	6	---	---	---	5	---	---	---	---	---	---	16	---	---	---	---	16	
402T	Persons on side/end of locos/cars contacting fixed objects - eqp mov.....	---	---	29	91	---	---	12	41	---	---	---	---	2	4	179	---	---	---	1	180	
409T	Persons on loco/car coming in contact with fixed obj(other) -eqp mov.....	1	---	7	28	2	2	14	16	---	---	6	---	3	---	82	---	---	---	1	86	
GRAND TOTAL		1	---	41	125	2	2	26	62	---	---	6	---	3	2	277	---	---	---	2	282	

TABLE 108-C ILLNESSES IN TRAIN INCIDENTS TO PERSONS ON LOCOMOTIVES OR CARS CONTACTING FIXED STRUCTURES
BY SPECIFIC OCCURENCE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

		Employees on Duty															Employees not on duty		Other Persons			Total Illnesses All Classes		
		Yard Service					Freight					Passenger					Trn	Oth	Pas	Non	Trs			
		Eng	Fmn	Cnd	Brk		Eng	Fmn	Cnd	Brk		Eng	Fmn	Cnd	Bag	Flg							Hos	All Oth
Occurrence No.	Occurences	Mtr	Hlp	For	Hlp		Mtr	Hlp	Cnd	Flg		Mtr	Hlp	Cnd	Bag	Flg				Trn	Oth	Pas	Non	Trs
409T	Persons on loco/car coming in contact with fixed obj (other) -eqp mov									1										1				
GRAND TOTAL										1										1				

NOTE: Bag = Baggage-men For = Foremen Non = Nontresspassers
Brk = Brakemen Hlp = Helpers Oth = Others
Cnd = Conductors Fmn = Firemen Pas = Passengers
Eng = Engineers Hos = Hostlers Trn = Trainmen
Flg = Flagmen Mtr = Motormen Trs = Trespassers

TABLE 108-E INJURIES IN TRAIN INCIDENTS TO PERSONS ON LOCOMOTIVES OR CARS CONTACTING FIXED STRUCTURES
BY SPECIFIC OCCURENCE AND CLASS OF PERSON, RAPID TRANSIT RAILROADS, 1977

Occurrence No.	Occurrences	Employees on Duty.....															Employees not on duty		Other Persons.....			Total Injuries All Classes			
		Yard Service.....					Freight.....					Road Service.....					Passenger.....								
		Eng	Fnn	Cnd	Brk		Eng	Fnn	Cnd	Brk		Eng	Fnn	Cnd	Brk		Eng	Fnn	Cnd	Brk					
		+ Mtr	+ Hlp	+ For	+ Hlp		+ Mtr	+ Hlp		+ Flg	+ Mtr	+ Hlp		Cnd	Bag	+ Flg	Hos	All Oth	Tot	Trn	Oth		Pas	Non	Trs
409T	Persons on loco/car coming in contact with fixed obj(other)-eqp mov.....	---	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	---	1	---	---	1	---	---	2
GRAND TOTAL.....		---	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	---	1	---	---	1	---	---	2

TABLE 109-A FATALITIES IN TRAIN INCIDENTS TO PERSONS GETTING ON OR OFF CARS OR LOCOMOTIVES
BY SPECIFIC OCCURENCE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

Occurrence No.	Occurrences	Employees on Duty															Employees not on duty		Other Persons			Total Killed All Classes	
		Yard Service					Freight					Road Service					Passenger						
		Eng +	Fnn +	Cnd +	Brk +		Eng +	Fnn +	Cnd	Brk +		Eng +	Fnn +	Cnd	Brk +		Eng +	Fnn +	Cnd	Brk +			
		Mtr	Hlp	For	Hlp		Mtr	Hlp				Mtr	Hlp				Mtr	Hlp					
501T	Slip/fell due to lost/misled hold of grabiron,handhold,etc.-eqp mov.....																					4	4
502T	Slip/fell due to losing/missing footing on step,stirrup,etc.-eqp mov.....																					5	5
507T	Falling, slipping, tripping, not elsewhere classified - eqp moving.....				1				2												1	3	7
511T	Strike/struck by eqp/structures(not bridge/trestle), or mat -eqp mov.....				1				2													3	3
512T	Striking or being struck by bridges or trestles - equipment moving.....																				1	1	1
513T	Jumping from equipment - equipment moving.....																				1	1	2
519T	Other acc/inc while getting on or off cars or locos - equipment mov.....				1																	7	8
GRAND TOTAL					3				2	2											2	21	30

TABLE 109-B INJURIES IN TRAIN INCIDENTS TO PERSONS GETTING ON OR OFF CARS OR LOCOMOTIVES
BY SPECIFIC OCCURENCE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

Occurrence No.	Occurrences	Employees on Duty															Employees not on duty		Other Persons			Total Injuries All Classes	
		Yard Service				Freight				Road Service				Passenger			Trn	Oth	Pas	Non	Trs		
		Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd							Brk
		Mtr	Hlp	For	Hlp	Mtr	Hlp	Cnd	Flg	Mtr	Hlp	Cnd	Bag	Flg	Hos	All Oth							Tot
501T	Slip/fell due to lost/misled hold of grabiron,handhold,etc.-eqp mov.....			8	63	2		7	71						3	4	158		2		1	7	168
502T	Slip/fell due to losing/missing footing on step,stirrup,etc.-eqp mov.....	1		27	133	4	1	31	125				2		1	7	332					13	345
503T	Stepping or tripping on parts of track in place - equipment moving.....			9	52			9	50							3	123						123
504T	Stepping or tripping on foreign material or irreg surface - eqp mov.....	4		71	297	5		55	259		1			2	4	8	706					2	708
505T	Slipping on ice or snow on ground - equipment moving.....			11	35			7	29				1		2	85							85
506T	Slipping on ice/snow on cars or locomotives - equipment moving.....			1	3			2	4				1			1	12						12
507T	Falling, slipping, tripping, not elsewhere classified - eqp moving.....		1	14	64		1	19	62						1	7	169			5	2	17	193
508T	Slipping/falling while boarding/alighting fm passenger eqp (moving).....			1	6			3	5				1		1	1	18			29	1	2	50
510T	Striking body or falling due to sudden movement of equipment. -eqp mov.....			5	21	2		17	25				1		6	77	2		5				84
511T	Strike/struck by eqp/structures(not bridge/trestle), or mat -eqp mov.....			12	67	1	2	12	33				1			2	130					1	131
512T	Striking or being struck by bridges or trestles - equipment moving.....				1											1						1	2
513T	Jumping from equipment - equipment moving.....	3		14	59	4	2	10	35						2	6	135			15	5	15	170
514T	Defective equipment - equipment moving.....			5	26			3	11							45							45
519T	Other acc/inc while getting on or off cars or locos - equipment mov.....	1		26	163	1	1	30	95		1	1			1	7	327			1		13	341
GRAND TOTAL.....		9	1	204	990	19	7	205	804		2	7	1	3	12	54	2318	2	2	55	9	71	2457

TABLE 109-D FATALITIES IN TRAIN INCIDENTS TO PERSONS GETTING ON OR OFF CARS OR LOCOMOTIVES
BY SPECIFIC OCCURENCE AND CLASS OF PERSON, RAPID TRANSIT RAILROADS, 1977

Occurrence No.	Occurrences	Employees on Duty.....																Employees not on duty		Other Persons.....			Total Killed All Classes
		Yard Service.....				Freight.....				Road Service.....				Passenger.....									
		Eng	Fmn	Cnd	Brk	Eng	Fmn	Brk	Eng	Fmn	Brk	Eng	Fmn	Brk	Bag	Flg	Hos	All Oth	Tot				
		+ Mtr	+ Hlp	+ For	+ Hlp	+ Mtr	+ Hlp	+ Cnd	+ Flg	+ Mtr	+ Hlp	+ Cnd											
511T	Strike/struck by eqp/structures(not bridge/trestle), or mat -eqp mov.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	1	---	---	---	---	1
GRAND TOTAL.....		---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	1	---	---	---	---	1

TABLE 109-E INJURIES IN TRAIN INCIDENTS TO PERSONS GETTING ON OR OFF CARS OR LOCOMOTIVES
BY SPECIFIC OCCURENCE AND CLASS OF PERSON, RAPID TRANSIT RAILROADS, 1977

Occurrence No.	Occurrences	Employees on Duty.....														Employees not on duty		Other Persons.....			Total Injuries All Classes		
		Yard Service.....				Freight.....				Road Service.....				Passenger.....				Trn	Oth	Pas		Non	Trs
		Eng	Fmn	Cnd	Brk	Eng	Fmn	Brk	Eng	Fmn	Brk	Eng	Fmn	Brk	Hos	All	Tot						
		+ Mtr	+ Hlp	+ For	+ Hlp	+ Mtr	+ Hlp	+ Cnd	+ Flg	+ Mtr	+ Hlp	+ Cnd	+ Bag	+ Flg									
501T	Slip/fell due to lost/missed hold of grabiron,handhold,etc.-eqp mov.....	---	---	---	---	---	---	---	---	---	1	---	---	---	1	2	---	---	---	---	2		
502T	Slip/fell due to losing/missing footing on step,stirrup,etc.-eqp mov.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---	1	
504T	Stepping or tripping on foreign material or irreg surface - eqp mov.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---	---	1	
507T	Falling, slipping, tripping, not elsewhere classified - eqp moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	4	---	---	4	
508T	Slipping/falling while boarding/alighting fm passenger eqp (moving).....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	10	---	---	10	
510T	Striking body or falling due to sudden movement of equipment.	---	---	---	---	---	---	---	---	---	---	---	---	---	1	1	---	---	81	2	---	84	
511T	Strike/struck by eqp/structures(not bridge/trestle), or mat -eqp mov.....	---	---	---	---	---	---	---	---	1	---	1	---	---	---	2	---	---	---	1	---	3	
514T	Defective equipment - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	16	---	---	16	
GRAND TOTAL.....		---	---	---	---	---	---	---	---	1	---	2	---	---	---	2	5	---	112	4	---	121	

NOTE: Bag = Baggage-men For = Foremen Non = Nontresspassers
Brk = Brakemen Hlp = Helpers Oth = Others
Cnd = Conductors Fmn = Firemen Pas = Passengers
Eng = Engineers Hos = Hostlers Trn = Trainmen
Flg = Flagmen Mtr = Motormen Trs = Trespassers

TABLE 110-A FATALITIES IN TRAIN INCIDENTS TO PERSONS AT RAIL-HIGHWAY GRADE CROSSINGS
BY SPECIFIC OCCURRENCE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

Occurrence No.	Occurrences	Employees on Duty														Employees not on duty		Other Persons			Total Killed All Classes				
		Yard Service				Freight				Passenger				Brk	Hos	All Oth	Tot	Trn	Oth	Pas		Non	Trs		
		Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk												
		Mtr	Hlp	For	Hlp	Mtr	Hlp	Cnd	Flg	Mtr	Hlp	Cnd	Bag											Flg	
601T	Casualty resulting fm a collision which did not satisfy \$ threshold				1												1							1	
602T	Casualty resulting fm a derailment which did not satisfy \$ threshold					1												1				1		2	
603T	Casualty resulting fm oth than Rail Equip A/I (not at rail-hwy X-ing)						1										1	2					1		3
609T	Casualty at public rail-hwy X-ing (not rptd on form 6180-54)-eqp nov								1						1		1	3					793	55	851
GRAND TOTAL					1	2			1					1		2	7					795	55	857	

TABLE 110-B INJURIES IN TRAIN INCIDENTS TO PERSONS AT RAIL-HIGHWAY GRADE CROSSINGS
BY SPECIFIC OCCURRENCE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

Occurrence No.	Occurrences	Employees on Duty														Employees not on duty		Other Persons			Total Injuries All Classes		
		Yard Service				Freight				Passenger				Brk	Hos	All Oth	Tot	Trn	Oth	Pas		Non	Trs
		Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk										
		Mtr	Hlp	For	Hlp	Mtr	Hlp	Cnd	Flg	Mtr	Hlp	Cnd	Bag										
601T	Casualty resulting fm a collision which did not satisfy \$ threshold	17	1	9	22	7	2	10	25	---	---	1	---	---	---	10	104	---	1	5	4	1	115
602T	Casualty resulting fm a derailment which did not satisfy \$ threshold	6	2	5	11	5	---	16	23	---	---	---	---	---	1	11	80	---	---	---	---	---	80
603T	Casualty resulting fm oth than Rail Equip A/I (not at rail-hwy X-ing)	---	---	1	3	1	1	2	4	---	---	1	---	---	---	2	15	---	---	1	1	3	20
609T	Casualty at public rail-hwy X-ing (not rptd on form 6180-54)-eqp nov	2	---	2	6	11	3	12	23	4	1	3	---	1	---	37	105	2	---	4	3974	193	4278
GRAND TOTAL		25	3	17	42	24	6	40	75	4	2	4	---	1	1	60	304	2	1	10	3979	197	4493

TABLE 110-C ILLNESSES IN TRAIN INCIDENTS TO PERSONS AT RAIL-HIGHWAY GRADE CROSSINGS
BY SPECIFIC OCCURRENCE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

		Employees on Duty														Employees not on duty		Other Persons			Total Illnesses All Classes		
Occurrence No.	Occurrences	Yard Service				Freight				Passenger				Brk	Hos	All Oth	Tot	Trn	Oth	Pas		Non	Trs
		Eng + Mtr	Fnn + Hlp	Cnd + For	Brk + Hlp	Eng + Mtr	Fnn + Hlp	Cnd + Flg	Brk + Mtr	Eng + Mtr	Fnn + Hlp	Cnd + Bag	Brk + Flg										
602T	Casualty resulting fm a derailment which did not satisfy \$ threshold	---	---	---	1	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	---	---	1
609T	Casualty at public rail-hwy X-ing (not rptd on form 6180-54)-eqp nov	---	---	---	---	---	---	---	---	---	---	---	---	---	---	2	2	---	---	---	---	---	2
GRAND TOTAL		---	---	---	1	---	---	---	---	---	---	---	---	---	---	2	3	---	---	---	---	---	3

TABLE 110-E INJURIES IN TRAIN INCIDENTS TO PERSONS AT RAIL-HIGHWAY GRADE CROSSINGS
BY SPECIFIC OCCURRENCE AND CLASS OF PERSON, RAPID TRANSIT RAILROADS, 1977

Occurrence No.	Occurrences	Employees on Duty														Employees not on duty		Other Persons			Total Injuries All Classes			
		Yard Service				Freight				Passenger				Brk +	Hos	All Oth	Tot	Trn	Oth	Pas		Non	Trs	
		Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk											
		Mtr	Hlp	For	Hlp	Mtr	Hlp	Cnd	Flg	Mtr	Hlp	Cnd	Bag											Flg
609T	Casualty at public rail-hwy X-ing (not rptd on form 6180-54)-eqp nov															1	1						1	2
GRAND TOTAL																1	1						1	2

NOTE: These tables also include those train incidents which resulted from collisions, derailments or other events such as explosions, obstructions, etc., that did not satisfy the reporting threshold for train accidents. (See Appendix)

Bag = Baggagemen
Brk = Brakemen
Cnd = Conductors
Eng = Engineers
Flg = Flagmen
For = Foremen
Hlp = Helpers
Fnn = Firemen
Hos = Hostlers
Mtr = Motormen
Non = Nontrespassers
Oth = Others
Pas = Passengers
Trn = Trainmen
Trs = Trespassers

TABLE 111-A FATALITIES IN TRAIN INCIDENTS TO PERSONS STRUCK OR RUN OVER AT PLACES OTHER THAN RAIL-HIGHWAY CROSSINGS BY SPECIFIC OCCURRENCE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

Occurrence No.	Occurrences	Employees on Duty.....																Employees not on duty		Other Persons.....			Total Killed All Classes
		Yard Service.....				Freight.....				Road Service.....				Passenger.....				Trn	Oth	Pas	Non	Trs	
		Eng +	Fmn +	Cnd +	Brk +	Eng +	Fmn +	Cnd	Brk +	Eng +	Fmn +	Cnd	Brk +	Hos	All Oth	Tot							
		Mtr	Hlp	For	Hlp	Mtr	Hlp		Flg	Mtr	Hlp		Flg										
701T	Standing, walking or running on or along track - equipment moving.....	---	---	---	1	---	---	1	2	---	---	---	---	---	4	8	---	---	---	2	104	114	
702T	Crossing track at private rail-highway crossing - equipment moving.....	---	---	---	---	---	---	---	1	---	---	---	---	---	1	2	---	---	---	42	---	42	
703T	Crossing track not at a crossing - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	2	26	30		
704T	While on public thoroughfare - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	3	4		
705T	On bridges or trestles - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	20	21		
706T	Sitting or lying on track or near track, not in clear - eqp moving.....	---	---	---	---	---	---	---	1	---	---	---	---	---	---	1	---	---	---	---	131	132	
707T	While working on or along track - equipment moving..	---	---	2	---	---	---	1	---	---	---	---	---	---	2	5	---	---	---	1	---	6	
708T	Passing over, through, or under cars - equipment moving.....	---	---	1	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	---	21	22	
709T	Struck by or ran into locos/cars (not at public X-ing), misc-eqp mov.....	---	---	---	---	---	---	---	1	---	---	---	---	---	---	1	---	---	---	3	33	37	
GRAND TOTAL.....		---	---	3	1	---	---	2	5	---	---	---	---	---	7	18	---	---	---	52	338	408	

TABLE 111-B INJURIES IN TRAIN INCIDENTS TO PERSONS STRUCK OR RUN OVER AT PLACES OTHER THAN RAIL-HIGHWAY CROSSINGS BY SPECIFIC OCCURRENCE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROAD 1977

		Employees on Duty.....														Employees not on duty		Other Persons.....			Total Injuries All Classes		
		Yard Service.....				Freight.....				Road Service.....				Passenger.....									
Occurrence No.	Occurrences	Eng + Mtr	Fmn + Hlp	Cnd + For	Brk + Hlp	Eng + Mtr	Fmn + Hlp	Cnd	Brk + Flg	Eng + Mtr	Fmn + Hlp	Cnd	Brk + Flg	Hos	All Oth	Tot	Trn	Oth	Pas	Non		Trs	
701T	Standing, walking or running on or along track - equipment moving.....	---	---	6	13	---	---	3	11	---	---	---	---	---	8	41	1	1	2	10	72	127	
702T	Crossing track at private rail-highway crossing - equipment moving.....	---	---	---	3	2	---	---	6	---	---	---	---	1	3	15	---	---	---	177	3	195	
703T	Crossing track not at a crossing - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	3	3	1	---	---	7	34	45	
704T	While on public thoroughfare - equipment moving.....	---	---	---	2	---	---	---	---	---	---	---	---	---	4	6	---	---	---	---	4	10	
705T	On bridges or trestles - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	3	3	---	---	2	1	18	24	
706T	Sitting or lying on track or near track, not in clear - eqp moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	1	1	1	---	---	1	76	79	
707T	While working on or along track - equipment moving.....	---	---	3	18	---	---	1	2	---	---	---	---	---	17	41	---	---	---	7	2	50	
708T	Passing over, through, or under cars - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	38	38	
709T	Struck by or ran into locos/cars (not at public X-ing), misc-eqp mov.....	---	---	1	5	---	---	1	---	---	---	---	---	---	5	12	---	---	---	10	30	52	
GRAND TOTAL		---	---	10	41	2	---	5	19	---	---	---	---	1	44	122	3	1	4	213	277	620	

NOTE: Bag = Baggage men
Brk = Brakemen
Cnd = Conductors
Eng = Engineers
Flg = Flagmen
For = Foremen
Hlp = Helpers
Fmn = Firemen
Hos = Hostlers
Mtr = Motormen
Non = Nontrespassers
Oth = Others
Pas = Passengers
Trn = Trainmen
Trs = Trespassers

TABLE 111-C ILLNESSES IN TRAIN INCIDENTS TO PERSONS STRUCK OR RUN OVER AT PLACES OTHER THAN RAIL-HIGHWAY
CROSSINGS BY SPECIFIC OCCURENCE AND CLASS OF PERSON,
CLASS I AND CLASS II RAILROAD, 1977

		Employees on Duty																Employees not on duty		Other Persons			Total Illnesses All Classes
		Yard Service				Freight				Road Service				Passenger				Trn	Oth	Pas	Non	Trs	
		Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk						
Occurrence No.	Occurrences	Mtr	Hlp	For	Hlp	Mtr	Hlp	Cnd	Flg	Mtr	Hlp	Cnd	Bag	Flg	Hos	All Oth	Tot						
702T	Crossing track at private rail-highway crossing - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---	1	
705T	On bridges or trestles - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	1	
709T	Struck by or ran into locos/cars (not at public X-ing), misc-egp mov.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	1	
GRAND TOTAL		---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	2	3

TABLE 111-D FATALITIES IN TRAIN INCIDENTS TO PERSONS STRUCK OR RUN OVER AT PLACES OTHER THAN RAIL-HIGHWAY
CROSSINGS BY SPECIFIC OCCURENCE AND CLASS OF PERSON,
RAPID TRANSIT RAILROADS, 1977

		Employees on Duty.....															Employees not on duty		Other Persons.....			Total Killed All Classes	
		Yard Service.....					Freight.....					Road Service.....					Passenger.....						
		Eng	Fan	Cnd	Brk	Eng	Fan	Cnd	Brk	Eng	Fan	Cnd	Brk	Eng	Fan	Cnd	Brk	Eng	Fan	Cnd	Brk		
Occurrence No.	Occurrences	+ Mtr	+ Hlp	+ For	+ Hlp	+ Mtr	+ Hlp	Cnd	+ Flg	+ Mtr	+ Hlp	Cnd	Bag	+ Flg	Hos	All Oth	Tot	Trn	Oth	Pas	Non		Trs
701T	Standing, walking or running on or along track - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---	25	26
703T	Crossing track not at a crossing - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	4	4
706T	Sitting or lying on track or near track, not in clear - eqp moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	3	3
708T	Passing over, through, or under cars - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---	---	1
709T	Struck by or ran into locos/cars (not at public X-ing), misc-eqp mov.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	2	---	2
GRAND TOTAL.....		---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	2	2	32	36

TABLE 111-E INJURIES IN TRAIN INCIDENTS TO PERSONS STRUCK OR RUN OVER AT PLACES OTHER THAN RAIL-HIGHWAY
CROSSINGS BY SPECIFIC OCCURENCE AND CLASS OF PERSON,
RAPID TRANSIT RAILROADS, 1977

		Employees on Duty.....														Employees not on duty		Other Persons.....			Total Injuries All Classes						
		Yard Service.....				Freight.....				Road Service.....				Passenger.....													
Occurrence No.	Occurrences	Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk										
		+ Mtr	+ Hlp	+ For	+ Hlp	+ Mtr	+ Hlp		+ Flg	+ Mtr	+ Hlp			+ Flg					All Oth	Tot		Trn	Oth	Pas	Non	Trs	
701T	Standing, walking or running on or along track - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	2	3	---	---	1	2	26	32
703T	Crossing track not at a crossing - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	1	
706T	Sitting or lying on track or near track, not in clear - eqp moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	2	2	4	
708T	Passing over, through, or under cars - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---	---	1	
709T	Struck by or ran into locos/cars (not at public X-ing), misc-eqp mov.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	26	2	28	
GRAND TOTAL.....		---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	2	3	---	---	2	30	31	66

NOTE: Bag = Baggage-men For = Foremen Non = Nontravellers
Brk = Brakemen Hlp = Helpers Oth = Others
Cnd = Conductors Fnn = Firemen Pas = Passengers
Eng = Engineers Hos = Hostlers Trn = Trainmen
Flg = Flagmen Mtr = Motormen Trs = Trespassers

TABLE 112-B INJURIES IN TRAIN INCIDENTS TO PERSONS SERVICING OR MAINTAINING EQUIPMENT
BY SPECIFIC OCCURENCE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

		E m p l o y e e s o n D u t y															Employees not on duty		Other Persons			Total Injuries All Classes
		Yard Service				Freight				Road Service				Passenger			Trn	Oth	Pas	Non	Trs	
Occurrence No.	Occurences	Eng +	Fmn +	Cnd +	Brk +	Eng +	Fmn +	Cnd +	Brk +	Eng +	Fmn +	Cnd +	Bag +	Plg +	Hos	All Oth						
		Mtr	Hlp	For	Hlp	Mtr	Hlp	Cnd	Plg	Mtr	Hlp	Cnd	Bag	Plg								
802T	Crossing over, under, or between locos or cars - equipment moving.....	---	---	1	1	---	---	---	---	---	---	---	---	---	---	7	9	---	---	---	---	9
803T	Striking or being struck by eqp, structures, or material-eqp mov.....	---	---	---	4	---	---	1	3	---	---	---	---	---	1	85	94	---	---	2	---	96
813T	Loading and unloading materials - equipment moving..	---	---	---	---	---	---	---	---	---	---	---	---	---	---	3	3	---	---	---	---	3
815T	Moving equipment for repairs.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	54	54	---	---	---	---	54
825T	Other acc/inc while servicing or maintaining eqp-eqp moving.....	---	---	---	1	---	---	---	1	---	---	---	---	---	1	44	47	---	---	1	---	48
GRAND TOTAL.....		---	---	1	6	---	---	1	4	---	---	---	---	---	2	193	207	---	---	3	---	210

TABLE 112-E INJURIES IN TRAIN INCIDENTS TO PERSONS SERVICING OR MAINTAINING EQUIPMENT
BY SPECIFIC OCCURENCE AND CLASS OF PERSON, RAPID TRANSIT RAILROADS, 1977

		E m p l o y e e s o n D u t y															Employees not on duty		Other Persons			Total Injuries All Classes
Occurrence No.	Occurences	Yard Service					Freight					Road Service					Trn	Oth	Pas	Non	Trs	
		Eng +	Fmn +	Cnd +	Brk +	Eng +	Fmn +	Cnd +	Brk +	Eng +	Fmn +	Cnd +	Brk +	Eng +	Fmn +	Bag +						
		Mtr	Hlp	For	Hlp	Mtr	Hlp		Flg	Mtr	Hlp		Flg	Hos	All Oth	Tot						
803T	Striking or being struck by eqp, structures, or																					
	Material-eqp mov.....	1													2	3			1		1	
815T	Moving equipment for repairs.....																				3	
GRAND TOTAL		1													2	3			1		4	

NOTE: Bag = Baggage-men For = Foremen Non = Nontrespassers
 Brk = Brakemen Hlp = Helpers Oth = Others
 Cnd = Conductors Fmn = Firemen Pas = Passengers
 Eng = Engineers Hos = Hostlers Trn = Trainmen
 Flg = Flagmen Mtr = Motormen Trs = Trespassers

TABLE 113-A FATALITIES IN TRAIN INCIDENTS TO PERSONS MAINTAINING WAY AND STRUCTURES
BY SPECIFIC OCCURRENCE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

Occurrence No.	Occurrences	Employees on Duty														Employees not on duty		Other Persons		Total Killed All Classes			
		Yard Service				Freight				Road Service				Passenger		All Oth	Tot	Trn	Oth		Pas	Non	Trs
		Eng +	Fmn +	Cnd +	Brk +	Eng +	Fmn +	Cnd +	Brk +	Eng +	Fmn +	Cnd +	Brk +	Eng +	Fmn +								
		Mtr	Hlp	For	Hlp	Mtr	Hlp	Cnd	Flg	Mtr	Hlp	Cnd	Bag	Flg	Hos								
853T	Striking or being struck by eqp, structures, or material-eqp moving	---	---	---	---	---	---	---	---	---	---	---	---	---	---	3	3	---	---	---	---	3	
889T	Other acc/inc while maintaining way and structures-eqp moving	---	---	---	---	---	---	---	---	---	---	---	---	---	---	3	3	---	---	---	---	3	
GRAND TOTAL		---	---	---	---	---	---	---	---	---	---	---	---	---	---	6	6	---	---	---	---	6	

TABLE 113-B INJURIES IN TRAIN INCIDENTS TO PERSONS MAINTAINING WAY AND STRUCTURES
BY SPECIFIC OCCURRENCE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

		Employees on Duty														Employees not on duty		Other Persons		Total Injuries All Classes			
		Yard Service				Freight				Road Service				Passenger		All Oth	Tot	Trn	Oth		Pas	Non	Trs
Occurrence No.	Occurrences	Eng + Mtr	Fmn + Hlp	Cnd + For	Brk + Hlp	Eng + Mtr	Fmn + Hlp	Cnd	Brk + Flg	Eng + Mtr	Fmn + Hlp	Cnd	Bag	Brk + Flg	Hos								
852T	Crossing over, under, or between locos or cars-eqp moving	---	---	---	---	---	---	---	---	---	---	---	---	---	---	3	3	2	---	---	---	---	5
853T	Striking or being struck by eqp, structures, or material-eqp mov	---	---	2	---	---	---	---	1	---	---	---	---	---	---	187	150	---	---	1	---	191	
863T	Loading and unloading materials - equipment moving	---	---	---	---	---	---	---	1	---	---	---	---	---	---	3	4	---	---	---	---	4	
866T	Inhalation of or contact with fumes or gases - equipment moving	---	---	---	1	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	---	1	
874T	Stumbling, slipping, falling, caught, N.O.C. - equipment moving	---	---	---	---	---	---	---	---	---	---	---	---	---	---	2	2	---	---	---	---	2	
875T	Use of maintenance of way equipment (N.O.C.) - equipment moving	---	---	---	---	---	---	---	---	---	---	---	---	---	---	3	3	---	---	---	---	3	
889T	Other acc/inc while maintaining way and structures-eqp moving	---	---	---	---	---	---	---	1	---	---	---	---	---	---	48	49	---	---	---	---	49	
GRAND TOTAL		---	---	2	1	---	---	---	3	---	---	---	---	---	---	246	252	2	---	1	---	255	

TABLE 113-C ILLNESSES IN TRAIN INCIDENTS TO PERSONS MAINTAINING WAY AND STRUCTURES
BY SPECIFIC OCCURRENCE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

Occurrence No.	Occurrences	Employees on Duty																Employees not on duty		Other Persons			Total Illnesses All Classes
		Yard Service				Freight				Road Service				Passenger				Trn	Oth	Pas	Non	Trs	
		Eng	Fmn	Cnd	Brk	Eng	Fmn	Cnd	Brk	Eng	Fmn	Cnd	Brk	Eng	Fmn	Cnd	Brk						
		Htr	Hlp	For	Hlp	Htr	Hlp	Cnd	Flg	Htr	Hlp	Cnd	Bag	Flg	Hos	Oth	Tot						
989T	Other acc/inc while maintaining way and structures-eqp moving	---	---	---	---	---	---	---	---	---	---	---	---	---	---	4	4	---	---	---	---	---	4
GRAND TOTAL		---	---	---	---	---	---	---	---	---	---	---	---	---	---	4	4	---	---	---	---	---	4

NOTE: Bag = Baggagemen For = Foremen Non = Nontrespassers
Brk = Brakemen Hlp = Helpers Oth = Others
Cnd = Conductors Fmn = Firemen Pas = Passengers
Eng = Engineers Hos = Hostlers Trn = Trainmen
Flg = Flagmen Mtr = Motormen Trs = Trespassers

TABLE 113-D FATALITIES IN TRAIN INCIDENTS TO PERSONS MAINTAINING WAY AND STRUCTURES
BY SPECIFIC OCCURRENCE AND CLASS OF PERSON, RAPID TRANSIT RAILROADS, 1977

		Employees on Duty														Employees not on duty		Other Persons			Total Killed All Classes		
		Yard Service				Freight				Road Service				Passenger									
Occurrence No.	Occurrences	Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk	Eng	Fnn	Cnd	Brk	All					
		Mtr	Hlp	For	Hlp	Mtr	Hlp	Cnd	Flg	Mtr	Hlp	Cnd	Bag	Flg	Hos	Oth	Tot	Trn	Oth	Pas	Non	Trs	
853T	Striking or being struck by eqp, structures, or material-eqp mov																	1	1				1
GRAND TOTAL																		1	1				1

TABLE 113-E INJURIES IN TRAIN INCIDENTS TO PERSONS MAINTAINING WAY AND STRUCTURES
BY SPECIFIC OCCURRENCE AND CLASS OF PERSON, RAPID TRANSIT RAILROADS, 1977

		Employees on Duty														Employees not on duty		Other Persons			Total Injuries All Classes												
		Yard Service				Freight				Road Service				Passenger		Brk	Hos	All Oth	Tot	Trn		Oth	Pas	Non	Trs								
		Eng	Fnn	Cnd	Brk	Eng	Fnn	Brk	Eng	Fnn	Brk	Eng	Fnn	Brk	Bag											Flg	Nos	Tot	Trn	Oth	Pas	Non	Trs
Occurrence No.	Occurrences	Mtr	Hlp	For	Hlp	Mtr	Hlp	Cnd	Flg	Mtr	Hlp	Cnd	Bag	Flg																			
853T	Striking or being struck by eqp, structures, or material-eqp mov.										3		8					5	16						16								
GRAND TOTAL											3		8					5	16						16								

NOTE: Bag = Baggage men For = Foremen Non = Nontresspassers
Brk = Brakemen Hlp = Helpers Oth = Others
Cnd = Conductors Fnn = Firemen Pas = Passengers
Eng = Engineers Hos = Hostlers Trn = Trainmen
Flg = Flagmen Mtr = Motormen Trs = Trespassers

TABLE 11A-A FATALITIES IN TRAIN INCIDENTS TO PERSONS BY MISCELLANEOUS OCCURRENCES NOT ELSEWHERE CLASSIFIABLE
BY SPECIFIC OCCURRENCE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

Occurrence No.	Occurrences	Employees on Duty																Employees not on duty		Other Persons			Total Killed All Classes
		Yard Service				Freight				Road Service				Passenger				Trn	Oth	Pas	Non	Trs	
		Eng +	Fun +	Cnd +	Brk +	Eng +	Fun +	Brk +	Plg +	Eng +	Fun +	Brk +	Plg +	Eng +	Fun +	Brk +	All Oth						
		Mtr	Hlp	For	Hlp	Mtr	Hlp	Cnd	Plg	Mtr	Hlp	Cnd	Bag	Flg	Hos								
FREIGHT, BAGGAGE, EXPRESS OR MAIL																							
902T	Struck or caught by shifted lading-eqp moving	---	---	---	---	---	---	1	1	---	---	---	---	---	---	---	2	---	---	---	---	---	2
	SUBTOTAL	---	---	---	---	---	---	1	1	---	---	---	---	---	---	---	2	---	---	---	---	---	2
STUMBLING, SLIPPING, FALLING, CAUGHT																							
934T	Slip/fall, etc. between loco/car and other cars and struct-eqp mov.	---	---	---	2	---	---	---	1	---	---	---	---	---	---	---	3	---	---	---	---	1	4
935T	From bridges of trestles-equipment moving	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	2	2	
938T	While on locomotive or car-equipment moving	---	---	1	---	---	---	---	1	---	---	---	---	---	---	---	2	---	---	1	---	2	5
	SUBTOTAL	---	---	1	2	---	---	---	2	---	---	---	---	---	---	---	5	---	---	1	---	5	11
OTHER CAUSES																							
974T	Slack action in caboose	---	---	---	---	---	---	---	1	---	---	---	---	---	---	---	1	---	---	---	---	---	1
989T	Other accidents/incidents-equipment moving	---	---	---	1	---	---	---	---	---	---	---	---	---	---	---	1	2	---	1	---	4	7
	SUBTOTAL	---	---	---	1	---	---	---	1	---	---	---	---	---	---	---	1	3	---	1	---	4	8
GRAND TOTAL																							
		---	---	1	3	---	---	1	4	---	---	---	---	---	---	---	1	10	---	2	---	9	21
NOTE: Bag = Baggage-men For = Foremen Non = Nontrasspassers Brk = Brakemen Hlp = Helpers Oth = Others Cnd = Conductors Fun = Firemen Pas = Passengers Eng = Engineers Hos = Hostlers Trn = Trainmen Flg = Flagmen Mtr = Motormen Trs = Trespassers																							

NOTE: Bag = Baggage-men For = Foremen Non = Nontravellers
Brk = Brakemen Hlp = Helpers Oth = Others
Cnd = Conductors Fun = Firemen Pas = Passengers
Eng = Engineers Hos = Hostlers Trn = Trainmen
Flg = Flagmen Mtr = Motormen Tks = Trespassers

TABLE 114-B INJURIES IN TRAIN INCIDENTS TO PERSONS BY MISCELLANEOUS OCCURRENCES NOT ELSEWHERE CLASSIFIABLE
BY SPECIFIC CAUSE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

Occurrence No.	Occurrences	Employees on Duty															Employees not on duty		Other Persons			Total Injured All Classes		
		Yard Service					Freight					Road Service					Passenger		Trn	Oth	Pas		Non	Trs
		Eng + Htr	Fmn + Hlp	Cnd + Por	Brk + Hlp	Str	Eng + Htr	Fmn + Hlp	Cnd	Brk + Flg	Str	Eng + Htr	Fmn + Hlp	Cnd	Bag	Brk + Flg	Hos	All Oth						
FREIGHT, BAGGAGE, EXPRESS OR MAIL																								
901T	Handling freight, baggage, express or mail-eqp moving.....	---	---	---	---	---	---	---	1	---	---	---	---	1	1	---	5	8	---	---	---	8		
902T	Struck or caught by shifted lading-eqp moving.....	---	---	---	3	---	---	1	1	---	---	---	---	---	---	---	4	9	---	---	---	14		
903T	Tripping over, or struck by falling baggage in passenger car-eqp mov.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	5	---	5		
904T	Other acc/inc involving freight, baggage, express, or mail - eqp mov.....	---	---	1	---	---	---	---	3	---	---	---	---	---	---	---	3	7	---	---	2	9		
908T	Clo/opn frt/bag car doors, exc plug type car doors, def eqp-eqp mov.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	2	2	---	---	1	3		
909T	Clo/opn frt/bag car doors, exc plug type car doors, no def-eqp mov.....	---	---	---	2	---	---	1	---	---	---	---	---	1	---	---	2	6	---	---	1	7		
SUBTOTAL.....		---	---	1	5	---	---	2	5	---	---	---	2	1	---	16	32	---	---	5	4	46		
WINDOWS, DOORS, ETC.																								
912T	Closing or opening coach trap doors-equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	6	---	2	---	2	10	---	---	---	10		
913T	Interior doors-equipment moving.....	---	---	---	2	---	---	2	---	---	---	---	14	---	3	---	4	25	---	14	---	39		
914T	Opening or closing locomotive doors-equipment moving.....	3	---	7	14	8	4	2	21	1	1	1	---	---	2	---	64	---	---	---	64			
915T	Opening or closing locomotive windows-equipment moving.....	---	2	---	1	3	1	1	5	3	---	---	2	---	---	---	16	---	---	---	18			
916T	Opening or closing caboose doors-equipment moving.....	---	---	1	1	---	---	---	8	7	---	---	---	---	---	---	1	18	---	---	18			
917T	Opening or closing caboose windows-equipment moving.....	---	---	---	---	---	---	---	1	1	---	---	---	---	---	---	1	6	---	---	6			
918T	Opening and closing other windows-equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	1	---	2	---	1	4	---	---	4			
919T	Other accidents/incidents involving windows or doors-eqp mov.....	1	1	3	7	1	2	5	16	---	---	6	---	5	1	25	73	---	12	---	85			
SUBTOTAL.....		4	3	11	25	12	7	22	50	4	1	30	---	12	3	34	218	---	26	---	---	244		
PASSENGER CAR DOORS																								
920T	Caught by side doors while entering coach-equipment moving.....	---	---	---	1	---	---	---	---	---	---	---	4	---	1	1	1	8	---	2	---	10		
921T	Caught by side doors while exiting coach-equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	1	---	---	---	1			
923T	Dragged by train while caught in side doors, exiting coach.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	2	2	---	---	---	2		
SUBTOTAL.....		---	---	---	1	---	---	---	---	---	---	---	4	1	1	1	3	11	---	2	---	13		
STUMBLING, SLIPPING, FALLING, CAUGHT																								
930T	Stumbling/slipping, etc. on snow or ice - equipment moving.....	1	---	10	12	---	---	2	7	---	---	---	---	1	---	6	39	---	---	---	39			
931T	Stumbling/slipping, etc. on foreign mat./irregular surface-eqp mov.	---	---	16	59	2	1	6	30	1	---	---	7	---	2	1	12	137	---	3	1	141		
932T	Stumbling/slipping, etc. on parts of track in place-equipment moving.....	---	---	3	9	---	---	3	11	---	---	---	---	1	1	4	32	---	---	1	33			
934T	Slip/fall, etc. between loco/car and other cars and struct-eqp mov.	---	---	4	7	---	1	1	3	---	---	---	1	---	---	7	24	---	1	2	29			
935T	From bridges of trestles-equipment moving.....	---	---	---	---	---	---	---	1	---	---	---	---	---	---	---	1	---	---	---	1			
936T	From structures other than bridges or trestles-equipment moving.....	---	---	1	---	---	---	---	---	---	---	---	---	1	---	---	2	---	---	---	2			
937T	Into depressions - equipment moving.....	---	1	4	6	---	---	1	5	---	---	---	---	1	---	2	20	---	---	---	20			
938T	While on locomotive or car-equipment moving.....	---	---	19	85	7	2	43	80	1	19	---	10	1	47	314	---	78	1	13	406			
939T	Other, stumbling, slipping, falling, caught, etc. - equipment moving.....	---	---	7	10	1	---	7	16	---	---	---	3	---	1	20	65	1	7	1	76			
SUBTOTAL.....		1	1	64	188	10	4	63	153	1	1	30	---	17	3	98	634	1	89	6	19	749		
FLYING OR FALLING OBJECTS, BURNS AND SIMILAR CAUSES																								
940T	Foreign object in eye-equipment moving.....	36	19	80	418	66	15	113	379	4	1	22	---	4	3	37	1197	---	1	2	---	1200		
941T	Struck by flying or falling object (except assaults)-eqp mov.....	1	---	6	37	7	2	9	28	3	---	2	---	---	1	23	119	---	4	9	---	132		
942T	Electrical flash, shock, or burn-equipment moving.....	---	---	---	1	---	---	---	---	---	---	---	---	---	---	---	1	---	---	1	1	3		
943T	Fire or explosion of fuses or torpedoes-equipment moving.....	---	---	16	---	1	---	2	7	---	---	---	---	---	---	2	28	---	---	---	28			
944T	Other fire or explosion-equipment moving.....	---	---	---	---	---	---	2	2	---	---	---	---	---	---	3	8	---	1	---	11			
945T	Burned by hot or corrosive substances-equipment moving.....	---	---	9	33	2	2	2	13	---	---	1	---	---	---	28	90	---	1	1	93			
946T	Inhalation of or contact with fumes or gases-equipment moving.....	---	---	1	1	2	---	5	3	---	---	---	---	---	---	2	14	---	---	---	14			
949T	Other A/I resulting from flying/falling obje, burns, etc. - eqp mov.....	---	---	1	6	---	1	4	4	---	---	---	---	---	---	11	27	---	1	---	28			
SUBTOTAL.....		37	19	97	511	79	21	137	436	7	1	25	---	5	3	106	1484	---	8	13	4	1509		
OPERATION OF ON-TRACK WORK EQUIPMENT																								
950T	Collision with train or car.....	1	---	---	2	---	---	1	1	---	---	1	---	---	---	13	19	1	---	---	20			
951T	Collision with other on-track work equipment.....	1	---	1	2	---	---	1	1	---	---	---	---	---	---	28	34	---	---	---	34			
952T	Jumping from equipment in anticipation of a collision.....	---	---	3	1	1	1	1	3	---	---	---	---	---	---	23	32	---	---	---	32			
953T	Deraiment that does not satisfy monetary threshold.....	---	---	1	3	---	---	4	1	---	---	---	---	---	---	63	72	---	---	---	72			
954T	Getting on/off on-track work equipment - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	16	16	---	---	---	16			
959T	Other A/I involving on-track work equipment - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	101	101	---	---	---	101			
SUBTOTAL.....		2	---	2	10	1	1	7	6	---	---	1	---	---	---	244	274	1	---	---	275			
ASSAULT																								
960T	Struck by thrown or otherwise propelled object,while on loco-eqp mov.....	8	---	3	7	38	9	6	31	10	5	1	---	---	---	118	---	---	1	---	119			
961T	Struck by thrown or otherwise propelled object,while no cab-eqp mov.....	---	---	1	4	---	---	42	37	---	---	---	---	1	---	2	87	---	---	---	87			
962T	Struck by thrown or otherwise propelled object,while on car-eqp mov.....	---	---	3	---	---	---	---	3	---	---	---	3	---	4	2	15	---	6	---	21			

(CONT.)

TABLE 114-B INJURIES IN TRAIN INCIDENTS TO PERSONS BY MISCELLANEOUS OCCURRENCES NOT ELSEWHERE CLASSIFIABLE
BY SPECIFIC CAUSE AND CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

Occurrence No.	Occurrences	E m p l o y e e s o n D u t y.....																Employees not on duty		Other Persons.....		Total Injured All Classes	
		Yard Service.....				Freight.....				Road Service.....				Passenger.....									
		Eng	Fmn	Cnd	Brk	Eng	Fmn	Cnd	Brk	Eng	Fmn	Cnd	Brk	Eng	Fmn	Cnd	Brk						
		+ Mtr	+ Hlp	+ For	+ Hlp	+ Mtr	+ Hlp	+ Cnd	+ Flg	+ Mtr	+ Hlp	+ Cnd	+ Bag	+ Flg	+ Hos	+ All Oth	+ Tot						
ASSAULT (CONT.)																							
964T	Other assaults to persons on trains-equipment moving.....	---	---	1	---	2	1	---	3	---	---	5	---	2	---	1	15	---	---	4	---	---	19
	SUBTOTAL.....	8	---	5	14	40	10	48	74	10	5	9	---	7	---	5	235	---	---	11	---	---	246
OTHER CAUSES																							
970T	Performing rerailling or other clearing operations-equipment moving.....	---	---	1	---	---	---	---	---	---	---	---	---	---	---	7	8	---	---	---	---	8	
971T	Loco or car coming against car placed for loading or unloading.....	1	---	1	6	1	---	2	1	---	---	---	---	---	---	2	14	---	---	---	3	---	17
972T	Sudden movement of car, not otherwise classified.....	2	1	7	32	1	2	15	25	---	---	4	---	1	---	29	119	---	---	4	2	2	127
974T	Slack action in caboose.....	---	---	14	22	---	1	239	225	---	---	1	---	---	---	5	507	---	---	---	---	---	507
975T	Slack action, other.....	6	1	14	44	5	2	19	52	---	---	---	---	---	---	12	155	---	---	---	---	---	155
976T	Emergency or severe application of air brakes due to def eqp.....	---	---	---	1	---	---	12	12	---	---	---	---	1	---	2	28	---	---	---	---	---	28
977T	Emergency or severe application of air brakes not due to def eqp.....	1	1	2	14	---	1	29	37	---	---	---	---	---	---	3	88	---	---	---	---	---	88
978T	Motor vehicle A/I (other than rail highway grade crossing) - eqp std.....	---	---	---	1	---	---	1	1	---	---	---	---	---	---	13	16	---	1	---	---	17	
989T	Other accidents/incidents-equipment moving.....	1	1	11	38	1	2	16	38	---	---	3	---	---	---	64	175	1	---	15	6	10	207
	SUBTOTAL.....	11	4	50	158	8	8	333	391	---	---	8	---	2	---	137	1110	1	1	19	11	12	1154
GRAND TOTAL.....		63	27	230	912	150	51	612	1115	22	8	107	3	45	10	643	3998	3	1	160	34	40	4236
NOTE: Bag = Baggage men For = Foremen Non = Nontresspassers																							
Brk = Brakemen Hlp = Helpers Oth = Others																							
Cnd = Conductors Fmn = Firemen Pas = Passengers																							
Eng = Engineers Hos = Hostlers Trn = Trainmen																							
Flg = Flagmen Mtr = Motormen Trs = Trespassers																							

1
5
1

TABLE 114-C ILLNESSES IN TRAIN INCIDENTS TO PERSONS BY MISCELLANEOUS OCCURRENCES NOT ELSEWHERE CLASSIFIABLE
BY SPECIFIC CAUSE AND CLASS OF PERSON,
CLASS I AND II RAILROADS, 1977

		CLASS I AND II RAILROADS, 1977																Employees not on duty		Other Persons			Total illnesses All Classes		
		Yard Service				Freight				Road Service				Passenger				Trn	Oth	Pas	Non	Trs			
		Eng +	Fmn +	Cnd +	Brk +	Eng +	Fmn +	Cnd +	Brk +	Eng +	Fmn +	Cnd +	Brk +	Eng +	Fmn +	Cnd +	Brk +							Hos	All Oth
Occurrence No.	Occurrences	Mtr	Hlp	For	Hlp	Mtr	Hlp	Cnd	Flg	Mtr	Hlp	Cnd	Bag	Flg											
STUMBLING, SLIPPING, FALLING, CAUGHT																									
931T	Stumbling/slipping, etc. on foreign mat./irregular surface-eqp mov.	---	---	---	1	---	---	---	---	---	---	---	---	---	---	1	---	---	---	---	1				
938T	While on locomotive or car-equipment moving	---	---	---	1	---	---	---	---	---	---	---	---	1	---	---	---	---	---	2					
SUBTOTAL		---	---	---	2	---	---	---	---	---	---	---	---	1	---	---	---	---	---	3					
FLYING OR FALLING OBJECTS, BURNS AND SIMILAR CAUSES																									
943T	Fire or explosion of fuses or torpedoes-equipment moving	---	---	1	2	---	---	---	1	---	---	---	---	---	---	1	5	---	---	---	5				
944T	Other fire or explosion-equipment moving	---	---	---	---	1	---	---	1	---	---	---	---	---	---	2	---	---	---	2					
945T	Burned by hot or corrosive substances-equipment moving	---	---	---	9	---	---	1	2	1	---	---	---	---	---	14	---	---	---	14					
946T	Inhalation of or contact with fumes or gases-equipment moving	4	---	10	23	1	2	12	23	---	---	---	---	---	---	6	81	---	---	81					
949T	Other A/I resulting from flying/falling objs, burns, etc. - eqp mov	1	---	---	---	---	---	---	3	---	---	1	---	---	---	3	8	---	---	8					
SUBTOTAL		5	---	11	34	2	2	13	30	1	---	1	---	---	---	11	110	---	---	110					
OTHER CAUSES																									
970T	Performing rerailling or other clearing operations-equipment moving	---	---	---	---	---	---	---	---	---	---	---	---	---	---	2	2	---	---	---	2				
974T	Slack action in caboose	---	---	---	---	---	---	1	---	---	---	---	---	---	---	1	---	---	---	1					
989T	Other accidents/incidents-equipment moving	1	---	---	4	---	---	1	4	---	---	1	---	---	---	7	18	---	1	---	19				
SUBTOTAL		1	---	---	4	---	---	2	4	---	---	1	---	---	---	9	21	---	---	---	22				
GRAND TOTAL		6	---	11	40	2	2	15	34	1	---	2	---	1	---	20	134	---	1	---	135				

TABLE 114-D FATALITIES IN TRAIN INCIDENTS TO PERSONS BY MISCELLANEOUS OCCURRENCES NOT ELSEWHERE CLASSIFIABLE
BY SPECIFIC CAUSE AND CLASS OF PERSON, RAPID TRANSIT CARRIERS, 1977

Occurrence No.	Occurrences	Employees on Duty																Employees not on duty		Other Persons			Total Killed All Classes	
		Yard Service				Freight				Road Service				Passenger				Tra	Oth	Pas	Non	Trs		
		Eng +	Fmn +	Cnd +	Brk +	Eng +	Fmn +	Cnd +	Brk +	Eng +	Fmn +	Cnd +	Brk +	Eng +	Fmn +	Cnd +	Brk +							
		Mtr	Hlp	For	Hlp	Mtr	Hlp	Cnd	Flg	Mtr	Hlp	Cnd	Bag	Flg	Hos	All Oth	Tot							
STUNBLING, SLIPPING, FALLING, CAUGHT																								
934T	Slip/fall, etc. between loco/car and other cars and struct-eqp std.	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	3	---	1	4
936T	While on locomotive or car-equipment standing	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---	---	1
SUBTOTAL		---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	4	---	1	5
GRAND TOTAL		---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	4	---	1	5
NOTE: Bag = Baggage men For = Foremen Non = Nontresspassers																								
Brk = Brakemen Hlp = Helpers Oth = Others																								
Cnd = Conductors Fmn = Firemen Pas = Passengers																								
Eng = Engineers Hos = Hostlers Trn = Trainmen																								
Flg = Flagmen Mtr = Motormen Trs = Trespassers																								

TABLE 114-E INJURIES IN TRAIN INCIDENTS TO PERSONS BY MISCELLANEOUS OCCURRENCES NOT ELSEWHERE CLASSIFIABLE
BY SPECIFIC CAUSE AND CLASS OF PERSON, RAPID TRANSIT CARRIERS, 1977

Occurrence No.	Occurrences	Employees on Duty.....															Employees not on duty		Other Persons.....			Total Injured All Classes
		Yard Service.....					Freight.....					Road Service.....					Trn	Oth	Pas	Non	Trs	
		Eng + Mtr	Fmn + Hlp	Cnd + For	Brk + Hlp		Eng + Mtr	Fmn + Hlp	Cnd	Brk + Flg		Eng + Mtr	Fmn + Hlp	Cnd	Brk + Flg	Hos						
WINDOWS, DOORS, ETC.																						
913T	Interior doors-equipment moving.....	---	---	---	---	---	---	---	---	---	6	---	24	---	---	---	30	---	---	11	---	41
914T	Opening or closing locomotive doors-equipment moving.....	---	---	---	---	---	---	---	---	---	1	---	---	---	---	---	1	---	---	---	2	
915T	Opening or closing locomotive windows-equipment moving.....	---	---	---	---	---	---	---	---	---	2	---	14	---	---	---	17	---	---	---	17	
919T	Other accidents/incidents involving windows or doors-egp mov.....	---	---	---	---	---	---	---	---	---	2	---	1	---	---	---	3	---	21	2	26	
SUBTOTAL.....		---	---	---	---	---	---	---	---	---	11	---	39	---	---	---	1	51	---	33	2	86
PASSENGER CAR DOORS																						
920T	Caught by side doors while entering coach-equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---	1	
922T	Dragged by train while caught in side doors, entering coach.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	5	---	5	
923T	Dragged by train while caught in side doors, exiting coach.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	9	---	9	
SUBTOTAL.....		---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	15	---	15	
STUMBLING, SLIPPING, FALLING, CAUGHT																						
931T	Stumbling/slipping, etc. on foreign sat./irregular surface-egp mov.	---	---	---	---	---	---	---	---	---	5	---	5	---	---	---	10	---	5	---	15	
932T	Stumbling/slipping, etc. on parts of track in place-equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	
934T	Slip/fall, etc. between loco/car and other cars and struct-egp mov.	---	---	---	---	---	---	---	---	---	---	---	3	---	---	---	4	---	20	---	24	
935T	From bridges or trestles-equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	1	
936T	From structures other than bridges or trestles-equipment moving....	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	1	---	---	1	3	
938T	While on locomotive or car-equipment moving.....	---	---	---	---	---	---	---	---	---	3	---	9	---	---	---	13	---	127	3	144	
939T	Other, stumbling, slipping, falling, caught, etc. - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	4	5	25	3	33	
SUBTOTAL.....		---	---	---	---	---	---	---	---	---	8	---	19	---	---	---	7	34	177	7	221	
FLYING OR FALLING OBJECTS, BURNS AND SIMILAR CAUSES																						
940T	Foreign object in eye-equipment moving.....	---	---	---	---	---	---	---	---	---	9	---	16	---	---	---	6	31	1	2	35	
941T	Struck by flying of falling object (except assaults)-egp mov.....	---	---	---	---	---	---	---	---	---	6	---	8	---	---	---	1	15	7	---	22	
942T	Electrical flash, shock, or burn-equipment moving.....	---	---	---	---	---	---	---	---	---	1	---	1	---	---	---	2	---	---	---	2	
945T	Burned by hot or corrosive substances-equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	1	---	1	---	2	
SUBTOTAL.....		---	---	---	---	---	---	---	---	---	16	---	26	---	---	---	7	49	1	10	1	61
OPERATION OF ON-TRACK WORK EQUIPMENT																						
952T	Jumping from equipment in anticipation of a collision.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	1	---	---	1	
953T	Derailed that does not satisfy monetary threshold.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	1	---	---	1	
954T	Getting on/off on-track work equipment - equipment moving.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	3	---	3	
SUBTOTAL.....		---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	2	2	---	3	---	5
ASSAULT																						
960T	Struck by thrown or otherwise propelled object,while on loco-egp mov.....	---	---	---	---	---	---	---	---	---	9	---	3	---	---	---	12	---	1	---	13	
962T	Struck by thrown or otherwise propelled object,while on car-egp mov.....	---	---	---	---	---	---	---	---	---	2	---	7	---	---	---	9	---	53	2	64	
964T	Other assaults to persons on trains-equipment moving.....	---	---	---	---	---	---	---	---	---	10	---	13	---	---	---	7	30	1	---	31	
SUBTOTAL.....		---	---	---	---	---	---	---	---	---	21	---	23	---	---	---	7	51	55	2	108	
OTHER CAUSES																						
972T	Sudden movement of car, not otherwise classified.....	---	---	---	---	---	---	---	---	---	1	---	11	---	---	---	16	28	44	---	72	
977T	Emergency or severe application of air brakes not due to def egp....	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	1	2	---	---	2	
969T	Other accidents/incidents-equipment moving.....	---	---	---	---	---	---	---	---	---	1	---	2	---	---	---	7	10	32	---	43	
SUBTOTAL.....		---	---	---	---	---	---	---	---	---	2	---	14	---	---	---	24	40	76	---	117	
GRAND TOTAL.....		---	---	---	---	---	---	---	---	---	58	---	121	---	---	---	48	227	1	369	12	613

NOTE: Bag = Baggage men For = Foremen Non = Nontresspassers
 Brk = Brakemen Hlp = Helpers Oth = Others
 Cnd = Conductors Fmn = Firemen Pas = Passengers
 Eng = Engineers Hos = Hostlers Trn = Trainmen
 Flg = Flagmen Mtr = Motormen Tra = Trespassers

TABLE 114-F ILLNESSES IN TRAIN INCIDENTS TO PERSONS BY MISCELLANEOUS OCCURRENCES NOT ELSEWHERE CLASSIFIABLE
BY SPECIFIC CAUSE AND CLASS OF PERSON,
RAPID TRANSIT CARRIERS, 1977

RAPID TRANSIT CARRIERS, 1977																											
Occurrence No.	Occurrences	D u t y.....															Employees not on duty		Other Persons.....			Total Illnesses All Classes					
		Yard Service.....					Freight.....					Road Serv.....					Passenger.....						Trn	Oth	Pas	Non	Trs
		Eng	Fmn	Cnd	Brk	Eng	Fmn	Cnd	Brk	Eng	Fmn	Cnd	Brk	Eng	Fmn	Cnd	Brk	Hos	All	Tot							
		Mtr	Hlp	For	Hlp	Mtr	Hlp	Cnd	Flg	Mtr	Hlp	Cnd	Bag	Flg	Mtr	Hlp	Cnd	Bag	Oth								
FLYING OR FALLING OBJECTS, BURNS AND SIMILAR CAUSES																											
946T	Inhalation of or contact with fumes or gases-equipment moving.....	---	---	---	---	---	---	---	---	---	---	1	---	---	---	---	1	---	---	---	---	---	---	---	1		
	SUBTOTAL.....	---	---	---	---	---	---	---	---	---	---	1	---	---	---	---	1	---	---	---	---	---	---	---	1		
OTHER CAUSES																											
972T	Sudden movement of car, not otherwise classified.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	1	---	---	---	---	---	---	1		
	SUBTOTAL.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	1	---	---	---	---	---	---	1		
GRAND TOTAL.....																											
NOTE: Bag = Baggage-men; For = Foremen; Non = Nontresspassers																											
Brk = Brakemen; Hlp = Helpers; Oth = Others																											
Cnd = Conductors; Fmn = Firemen; Pas = Passengers																											
Eng = Engineers; Hos = Hostlers; Trn = Trainmen																											
Flg = Flagmen; Mtr = Motormen; Trs = Treepassers																											

NOTE: Bag = Baggage-men
Brk = Brakemen
Cnd = Conductors
Eng = Engineers
Flg = Flagmen
For = Foremen
Hlp = Helpers
Fmn = Firemen
Hos = Hostlers
Mtr = Motormen
Non = Nontresspassers
Oth = Others
Pas = Passengers
Trn = Trainmen
Trs = Trespassers

TABLE 115 CASUALTIES TO TRAINMEN
IN TRAIN ACCIDENTS AND TRAIN INCIDENTS
CLASS I LINE HAUL RAILROADS IN 1977

Trainmen	Yard Service	Road Freight	Service..... Passenger	Total
Number of trainmen in service	69,019	71,663	8,044	148,726
Number of trainmen killed.....	25	34	2	61
Number of trainmen injured.....	8,542	8,461	628	17,631
Number of trainmen incurring illness.....	145	204	26	375
Number of trainmen killed per 1,000 in service.....	0.36	0.47	0.25	0.41
Number of trainmen injured per 1,000 in service.....	123.76	118.07	78.07	118.55
Number of trainmen incurring illness per 1,000 in service....	2.10	2.85	3.23	2.52

TABLE 116-A FATALITIES IN TRAIN ACCIDENTS, TRAIN INCIDENTS AND NON-TRAIN INCIDENTS
1977

Class of Railroad	Fatal Accidents	Total Acc	...Employees on Duty...			Empl not on Duty	Pass on Train	Non- Tresp	Tresp	Total
			Train Men	Other	Total					
TRAIN ACCIDENTS										
Class I Line-Haul	84	9,676	15	2	17	---	---	81	6	104
Class I Switching	---	368	---	---	---	---	---	---	---	---
Class II Railroads	3	318	2	---	2	---	---	2	---	4
Rapid Transit	2	60	1	---	1	---	11	---	---	12
TOTAL.....	89	10,422	18	2	20	---	11	83	6	120
TRAIN INCIDENTS										
Class I Line-Haul	1,132	13,622	43	16	59	---	3	817	407	1,286
Class I Switching	11	365	2	---	2	---	---	2	7	11
Class II Railroads	36	624	3	1	4	---	1	28	10	43
Rapid Transit	43	866	---	2	2	---	6	2	33	43
TOTAL.....	1,222	15,477	48	19	67	---	10	849	457	1,383
NON-TRAIN INCIDENTS										
Class I Line-Haul	76	47,767	3	25	28	2	---	21	27	78
Class I Switching	1	1,341	---	---	---	---	---	---	1	1
Class II Railroads	3	2,493	---	2	2	---	---	1	---	3
Rapid Transit	15	6,294	---	1	1	---	---	10	4	15
TOTAL.....	95	57,895	3	28	31	2	---	32	32	97

TABLE 116-B INJURIES IN TRAIN ACCIDENTS, TRAIN INCIDENTS AND NON-TRAIN INCIDENTS
1977

Class of Railroad	Injurious Accidents	Total Acc	...Employees on Duty...			Empl not on Duty	Pass on Train	Non- Tresp	Tresp	Total
			Train Men	Other	Total					
TRAIN ACCIDENTS										
Class I Line-Haul	532	9,676	582	73	655	7	76	166	16	920
Class I Switching	10	368	12	2	14	---	---	1	---	15
Class II Railroads	20	318	14	5	19	---	---	11	4	34
Rapid Transit	9	60	16	7	23	---	204	3	---	230
TOTAL.....	571	10,422	624	87	711	7	280	181	20	1,199
TRAIN INCIDENTS										
Class I Line-Haul	12,501	13,622	7,497	1,339	8,836	18	227	4,046	553	13,680
Class I Switching	343	365	280	24	304	---	---	37	15	356
Class II Railroads	589	624	382	53	435	1	5	171	21	633
Rapid Transit	811	866	225	62	287	1	488	48	36	860
TOTAL.....	14,244	15,477	8,384	1,478	9,862	20	720	4,302	625	15,529
NON-TRAIN INCIDENTS										
Class I Line-Haul	46,196	47,767	9,552	35,672	45,224	557	190	573	73	46,617
Class I Switching	1,313	1,341	461	822	1,283	14	---	13	4	1,314
Class II Railroads	2,464	2,493	676	1,778	2,454	8	1	9	1	2,473
Rapid Transit	6,238	6,294	532	3,292	3,824	2	471	2,035	204	6,536
TOTAL.....	56,211	57,895	11,221	41,564	52,785	581	662	2,630	282	56,940

TABLE 116-C ILLNESSES IN TRAIN ACCIDENTS, TRAIN INCIDENTS AND NON-TRAIN INCIDENTS
1977

Class of Railroad	Illness Accidents	Total Acc	...Employees on Duty...			Empl not on Duty	Pass on Train	Non- Tresp	Tresp	Total
			Train Men	Other	Total					
TRAIN ACCIDENTS										
Class I Line-Haul	11	9,676	12	1	13	---	---	3	---	16
Class I Switching	---	368	---	---	---	---	---	---	---	---
Class II Railroads	---	318	---	---	---	---	---	---	---	---
Rapid Transit	---	60	---	---	---	---	---	---	---	---
TOTAL.....	11	10,422	12	1	13	---	---	3	---	16
TRAIN INCIDENTS										
Class I Line-Haul	174	13,622	153	27	180	---	1	1	2	184
Class I Switching	12	365	11	1	12	---	---	---	---	12
Class II Railroads	8	624	11	---	11	---	---	---	---	11
Rapid Transit	12	866	4	8	12	---	---	---	---	12
TOTAL.....	206	15,477	179	36	215	---	1	1	2	219
NON-TRAIN INCIDENTS										
Class I Line-Haul	1,522	47,767	210	1,325	1,535	10	3	1	---	1,549
Class I Switching	27	1,341	11	16	27	---	---	---	---	27
Class II Railroads	26	2,493	4	22	26	---	---	---	---	26
Rapid Transit	41	6,294	2	41	43	---	---	---	---	43
TOTAL.....	1,616	57,895	227	1,404	1,631	10	3	1	---	1,645

TABLE 120-A TRAIN ACCIDENT AND INCIDENT FATALITIES TO TRESPASSERS
AND NON-TRESPASSERS, BY STATE - 1977
CLASS I AND CLASS II RAILROADS

State	Trespassers			Non-Trespassers			Total		
	Child	Adult	Total	Child	Adult	Total	Child	Adult	Total
Alabama	3	7	10	5	22	27	8	29	37
Alaska	---	---	---	---	1	1	---	1	1
Arizona	---	12	12	---	5	5	---	17	17
Arkansas	---	6	6	2	13	15	2	19	21
California	7	31	38	6	49	55	13	80	93
Colorado	---	1	1	3	14	17	3	15	18
Connecticut	---	2	2	---	3	3	---	5	5
Delaware	---	1	1	---	1	1	---	2	2
District of Columbia	---	1	1	---	---	---	---	1	1
Florida	1	20	21	9	45	54	10	65	75
Georgia	---	13	13	4	26	30	4	39	43
Hawaii	---	---	---	---	---	---	---	---	---
Idaho	---	1	1	3	6	9	3	7	10
Illinois	4	34	38	8	55	63	12	69	101
Indiana	2	13	15	10	61	71	12	74	86
Iowa	---	1	1	2	15	17	2	16	18
Kansas	---	3	3	4	19	23	4	22	26
Kentucky	2	12	14	---	17	17	2	29	31
Louisiana	1	7	8	1	23	24	2	30	32
Maine	---	---	---	---	2	2	---	2	2
Maryland	1	2	3	---	8	8	1	10	11
Massachusetts	2	6	8	---	---	---	2	6	8
Michigan	1	9	10	4	29	33	5	38	43
Minnesota	1	3	4	2	25	27	3	28	31
Mississippi	---	6	6	1	10	11	1	16	17
Missouri	2	7	9	3	21	24	5	28	33
Montana	---	2	2	---	5	5	---	7	7
Nebraska	2	4	6	1	16	17	3	20	23
Nevada	---	2	2	---	4	4	---	6	6
New Hampshire	---	---	---	---	1	1	---	1	1
New Jersey	2	14	16	---	7	7	2	21	23
New Mexico	---	8	8	---	4	4	---	12	12
New York	8	21	29	1	13	14	9	34	43
North Carolina	---	16	16	4	28	32	4	44	48
North Dakota	---	1	1	---	11	11	---	12	12
Ohio	4	16	20	7	47	54	11	63	74
Oklahoma	---	7	7	3	23	26	3	30	33
Oregon	---	5	5	---	9	9	---	14	14
Pennsylvania	2	10	12	1	23	24	3	33	36
Rhode Island	---	2	2	---	---	---	---	2	2
South Carolina	---	12	12	1	23	24	1	35	36
South Dakota	---	---	---	---	1	1	---	1	1
Tennessee	---	8	8	1	17	18	1	25	26
Texas	---	29	29	2	65	67	2	94	96
Utah	---	3	3	---	4	4	---	7	7
Vermont	---	---	---	---	---	---	---	---	---
Virginia	3	8	11	---	9	9	3	17	20
Washington	1	6	7	---	25	25	1	31	32
West Virginia	1	4	5	---	9	9	1	13	14
Wisconsin	1	3	4	1	26	27	2	29	31
Wyoming	---	---	---	---	1	1	---	1	1
Unknown	---	---	---	---	---	---	---	---	---
Tot al.....	51	379	430	89	841	930	140	1220	1360

TABLE 120-B TRAIN ACCIDENT AND INCIDENT INJURIES TO TRESPASSERS
AND NON-TRESPASSERS, BY STATE - 1977
CLASS I AND CLASS II RAILROADS

State	Trespassers			Non-Trespassers			Total		
	Child	Adult	Total	Child	Adult	Total	Child	Adult	Total
Alabama	1	5	6	11	112	123	12	117	129
Alaska	---	---	---	2	5	7	2	5	7
Arizona	---	9	9	---	17	17	---	26	26
Arkansas	1	1	2	3	134	137	4	135	139
California	4	38	42	16	189	205	20	227	247
Colorado	1	4	5	4	37	41	5	41	46
Connecticut	2	4	6	---	4	4	2	8	10
Delaware	---	---	---	---	8	8	---	8	8
District of Columbia	---	1	1	---	---	---	---	1	1
Florida	7	30	37	19	149	168	26	179	205
Georgia	1	8	9	13	130	143	14	138	152
Hawaii	---	---	---	---	---	---	---	---	---
Idaho	---	4	4	3	39	42	3	43	46
Illinois	13	59	72	17	299	316	30	358	388
Indiana	4	32	36	23	227	250	27	259	286
Iowa	---	2	2	4	86	90	4	88	92
Kansas	1	2	3	12	116	128	13	118	131
Kentucky	6	12	18	1	71	72	7	83	90
Louisiana	3	8	11	12	167	179	15	175	190
Maine	1	3	4	---	12	12	1	15	16
Maryland	3	3	6	---	27	27	3	30	33
Massachusetts	3	4	7	---	13	13	3	17	20
Michigan	4	24	28	21	204	225	25	228	253
Minnesota	2	8	10	4	78	82	6	86	92
Mississippi	2	14	16	24	89	113	26	103	129
Missouri	7	9	16	3	108	111	10	117	127
Montana	---	6	6	---	19	19	---	25	25
Nebraska	---	3	3	3	53	56	3	56	59
Nevada	---	2	2	---	5	5	---	7	7
New Hampshire	---	---	---	---	8	8	---	8	8
New Jersey	6	13	19	4	21	25	10	34	44
New Mexico	---	7	7	2	13	15	2	20	22
New York	3	18	21	4	49	53	7	67	74
North Carolina	3	15	18	13	134	147	16	149	165
North Dakota	---	6	6	1	9	10	1	15	16
Ohio	8	22	30	28	267	295	36	289	325
Oklahoma	---	4	4	8	83	91	8	87	95
Oregon	3	4	7	3	39	42	6	43	49
Pennsylvania	2	19	21	2	65	67	4	84	88
Rhode Island	---	---	---	---	1	1	---	1	1
South Carolina	3	13	16	15	99	114	18	112	130
South Dakota	---	2	2	---	10	10	---	12	12
Tennessee	3	8	11	5	77	82	8	85	93
Texas	1	39	40	33	461	494	34	500	534
Utah	---	3	3	1	38	39	1	41	42
Vermont	---	1	1	---	10	10	---	11	11
Virginia	2	4	6	4	71	75	6	75	81
Washington	4	9	13	5	60	65	9	69	78
West Virginia	2	10	12	3	47	50	5	57	62
Wisconsin	2	10	12	6	134	140	8	144	152
Wyoming	---	1	1	---	10	10	---	11	11
Unknown	---	---	---	---	---	---	---	---	---
Total.....	108	503	611	332	4104	4436	440	4607	5047

TABLE 120-C TRAIN ACCIDENT AND INCIDENT FATALITIES TO TRESPASSERS
AND NON-TRESPASSERS, BY STATE - 1977
RAPID TRANSIT CARRIERS

State	Trespassers			Non-Trespassers			Total		
	Child	Adult	Total	Child	Adult	Total	Child	Adult	Total
California	---	---	---	---	---	---	---	---	---
Connecticut	---	---	---	---	---	---	---	---	---
Delaware	---	---	---	---	---	---	---	---	---
District of Columbia	---	---	---	---	---	---	---	---	---
Illinois	---	2	2	---	---	---	---	2	2
Massachusetts	---	---	---	---	---	---	---	---	---
New Jersey	---	2	2	---	---	---	---	2	2
New York	1	22	23	---	2	2	1	24	25
Ohio	---	---	---	---	---	---	---	---	---
Pennsylvania	---	6	6	---	---	---	---	6	6
Unknown	---	---	---	---	---	---	---	---	---
TOTAL.....	1	32	33	---	2	2	1	34	35

TABLE 120-D TRAIN ACCIDENT AND INCIDENT INJURIES TO TRESPASSERS
AND NON-TRESPASSERS, BY STATE - 1977
RAPID TRANSIT CARRIERS

State	Trespassers			Non-Trespassers			Total		
	Child	Adult	Total	Child	Adult	Total	Child	Adult	Total
California	---	---	---	---	---	---	---	---	---
Connecticut	---	---	---	---	---	---	---	---	---
Delaware	---	---	---	---	---	---	---	---	---
District of Columbia	---	---	---	10	10	20	10	10	20
Illinois	4	4	8	4	4	8	8	8	16
Massachusetts	1	1	2	2	2	4	3	3	6
New Jersey	---	---	---	1	1	2	1	1	2
New York	28	28	56	2	29	31	2	57	59
Ohio	---	---	---	1	1	2	1	1	2
Pennsylvania	3	3	6	2	2	4	5	5	10
Unknown	---	---	---	---	---	---	---	---	---
TOTAL.....	36	36	72	2	49	51	2	85	87

TABLE 121-A CASUALTIES BY STATE AND CLASS OF ACCIDENT
CLASS I and II RAILROADS, 1977

State	Train Accidents			Train Incidents			Non- Train Incidents			Total.....		
	Killed	Injured	Illness	Killed	Injured	Illness	Killed	Injured	Illness	Killed	Injured	Illness
Alabama	3	26	1	35	280	---	2	614	12	40	920	13
Alaska	---	2	---	2	19	---	---	146	3	2	167	3
Arizona	1	7	---	16	94	1	1	153	2	18	254	3
Arkansas	1	13	---	20	293	3	1	669	15	22	975	18
California	4	74	1	94	861	24	5	2,324	60	103	3,259	85
Colorado	2	4	---	16	177	3	3	461	17	21	642	20
Connecticut	---	2	---	5	55	3	2	431	14	7	488	17
Delaware	---	1	---	2	42	---	---	340	26	2	363	26
District of Columbia	---	5	---	1	27	2	1	302	6	2	334	8
Florida	15	54	---	61	421	2	3	798	16	79	1,273	18
Georgia	5	22	---	41	532	---	3	1,119	25	49	1,673	25
Hawaii	---	---	---	---	---	---	---	---	---	---	---	---
Idaho	---	6	---	11	118	---	---	315	3	11	439	3
Illinois	8	83	---	102	1,146	16	5	4,975	127	115	6,204	143
Indiana	8	33	2	79	590	9	1	1,618	55	88	2,241	66
Iowa	4	16	---	16	262	2	1	1,056	17	21	1,334	19
Kansas	2	13	---	27	294	1	2	777	15	31	1,084	16
Kentucky	3	25	---	32	283	5	2	1,477	45	37	1,785	50
Louisiana	6	24	---	30	406	12	---	842	20	36	1,272	32
Maine	---	2	---	2	78	---	---	354	7	2	434	7
Maryland	---	11	---	13	177	---	1	866	44	14	1,054	44
Massachusetts	---	1	---	10	94	2	2	556	27	12	651	29
Michigan	3	43	---	44	707	5	3	2,124	58	50	2,874	63
Minnesota	3	15	---	31	240	2	---	1,154	38	34	1,409	40
Mississippi	1	22	4	18	252	2	---	429	4	19	703	10
Missouri	---	22	---	34	361	2	1	1,413	41	35	1,796	43
Montana	---	10	---	7	99	1	1	586	20	8	695	21
Nebraska	1	14	---	24	281	1	---	1,536	61	25	1,631	62
Nevada	---	4	---	7	44	1	---	127	1	7	175	2
New Hampshire	---	---	---	1	12	---	---	24	---	1	36	---
New Jersey	2	17	---	22	214	6	1	757	46	25	988	52
New Mexico	---	5	---	13	58	3	1	150	---	14	213	3
New York	1	33	1	46	510	17	3	2,969	158	50	3,512	176
North Carolina	1	33	---	48	335	2	4	424	11	53	792	13
North Dakota	1	8	---	11	80	1	1	275	8	13	363	9
Ohio	6	50	4	73	941	16	1	3,420	144	80	4,411	164
Oklahoma	6	10	---	27	185	---	1	376	8	34	571	8
Oregon	2	9	---	12	221	2	1	752	16	15	982	18
Pennsylvania	1	49	---	36	590	9	3	4,595	225	40	5,234	234
Rhode Island	---	---	---	2	5	---	---	88	4	2	93	4
South Carolina	5	20	---	34	221	2	1	297	6	40	538	8
South Dakota	---	1	1	1	35	---	---	134	---	1	170	1
Tennessee	1	14	1	26	286	2	1	895	12	28	1,195	15
Texas	3	50	---	100	1,319	31	13	2,875	84	116	4,244	115
Utah	---	9	---	10	135	---	2	350	---	12	494	---
Vermont	---	---	---	---	19	---	---	61	---	---	80	---
Virginia	2	13	---	20	315	3	3	1,294	18	25	1,622	21
Washington	3	35	---	30	291	4	3	835	29	36	1,161	33
West Virginia	1	20	---	14	184	6	1	660	18	16	864	24
Wisconsin	1	28	---	32	348	3	1	1,029	27	34	1,405	30
Wyoming	2	11	1	2	132	1	1	582	9	5	725	11
Unknown	---	---	---	---	---	---	---	---	---	---	---	---
Total.....	108	969	16	1,340	14,669	207	82	50,404	1,602	1,530	66,042	1,825

TABLE 121-B CASUALTIES BY STATE AND CLASS OF ACCIDENT
RAPID TRANSIT CARRIERS, 1977

State	Train Accidents			Train Incidents			Non-Train Incidents			Total.....		
	Killed	Injured	Illness	Killed	Injured	Illness	Killed	Injured	Illness	Killed	Injured	Illness
California	---	---	---	---	7	---	---	467	12	---	474	12
Connecticut	---	---	---	---	---	---	---	---	---	---	---	---
Delaware	---	---	---	---	---	---	---	---	---	---	---	---
District of Columbia	---	9	---	---	19	---	---	336	2	---	364	2
Illinois	11	208	---	5	162	---	4	669	2	20	1,039	2
Massachusetts	---	---	---	---	64	3	---	365	---	---	429	3
New Jersey	1	---	---	2	27	7	---	219	---	3	246	7
New York	---	7	---	30	532	2	10	4,091	27	40	4,630	29
Ohio	---	4	---	---	16	---	---	29	---	---	49	---
Pennsylvania	---	2	---	6	33	---	1	360	---	7	395	---
Unknown	---	---	---	---	---	---	---	---	---	---	---	---
TOTAL.....	12	230	---	43	860	12	15	6,536	43	70	7,626	55

TABLE 122-A ACCIDENTS BY STATE AND CLASS OF ACCIDENT
CLASS I and CLASS II RAILROADS, 1977

State	Train Accidents.....				Train Incidents	Non-Train Incidents	Total
	Collisions	Derailments	Other	Total			
Alabama	31	239	22	292	285	625	1,202
Alaska	1	10	1	12	18	149	179
Arizona	6	35	9	50	103	156	309
Arkansas	12	115	13	140	265	682	1,087
California	93	183	52	328	884	2,378	3,590
Colorado	14	62	11	87	174	479	740
Connecticut	1	12	9	22	63	447	532
Delaware	4	15	2	21	42	365	428
District of Columbia	0	6	1	7	30	309	346
Florida	25	259	24	308	419	816	1,543
Georgia	54	309	20	383	530	1,143	2,056
Hawaii	0	0	0	0	0	0	0
Idaho	11	55	14	80	119	317	516
Illinois	161	895	92	1,148	1,130	5,081	7,359
Indiana	37	327	30	394	587	1,666	2,647
Iowa	35	368	23	426	254	1,068	1,748
Kansas	27	169	19	215	275	790	1,280
Kentucky	61	345	26	432	295	1,521	2,248
Louisiana	18	192	19	229	388	857	1,474
Maine	13	32	5	50	77	358	485
Maryland	20	90	18	128	183	901	1,212
Massachusetts	3	26	16	45	95	577	717
Michigan	56	244	28	328	693	2,171	3,192
Minnesota	40	217	21	278	242	1,186	1,706
Mississippi	11	155	20	186	227	432	845
Missouri	33	184	17	234	364	1,448	2,046
Montana	18	92	8	118	98	606	822
Nebraska	29	167	11	207	284	1,593	2,084
Nevada	2	25	7	34	51	128	213
New Hampshire	1	11	1	13	12	24	49
New Jersey	12	48	14	74	207	723	1,004
New Mexico	10	21	4	35	67	149	251
New York	44	261	46	351	549	3,084	3,984
North Carolina	31	148	27	206	334	432	972
North Dakota	6	54	8	68	87	284	439
Ohio	62	408	40	510	932	3,529	4,971
Oklahoma	20	125	17	162	183	383	728
Oregon	18	74	8	100	223	767	1,090
Pennsylvania	52	539	49	640	607	4,715	5,962
Rhode Island	0	3	2	5	7	92	104
South Carolina	13	63	11	87	209	300	596
South Dakota	3	94	2	99	32	134	265
Tennessee	49	238	10	297	289	904	1,490
Texas	81	436	62	579	1,270	2,938	4,787
Utah	10	24	14	48	139	352	539
Vermont	1	4	0	5	18	60	83
Virginia	23	110	10	143	305	1,303	1,751
Washington	37	177	31	245	304	860	1,409
West Virginia	16	133	5	154	186	676	1,016
Wisconsin	36	201	21	258	347	1,054	1,659
Wyoming	22	73	6	101	129	589	819
Unknown	0	0	0	0	0	0	0
Total.....	1,363	8,073	926	10,362	14,611	51,601	76,574

TABLE 122-B ACCIDENTS BY STATE AND CLASS OF ACCIDENT
RAPID TRANSIT RAILROADS, 1977

State	Train Accidents.....				Train Incidents	Non- Train Incidents	Total
	Coll- isions	Derail- ments	Other	Total			
California	1	2	4	7	7	475	489
Connecticut	0	0	0	0	0	0	0
Delaware	0	0	0	0	0	0	0
District of Columbia	1	0	3	4	19	334	357
Illinois	6	8	5	19	167	671	857
Massachusetts	0	1	3	4	67	365	436
New Jersey	1	0	1	2	36	219	257
New York	9	8	1	18	515	3,840	4,373
Ohio	1	1	2	4	16	29	49
Pennsylvania	1	1	0	2	39	361	402
Unknown	0	0	0	0	0	0	0
TOTAL.....	20	21	19	60	866	6,294	7,220

TABLE 123-A TRAIN ACCIDENTS BY STATE, BY MONTH
CLASS I AND CLASS II RAILROADS, 1977

State	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Total
Alabama	36	28	37	23	16	18	23	22	20	21	27	21	292
Alaska	1	---	---	1	3	2	2	---	2	---	---	1	12
Arizona	4	3	8	4	3	3	5	4	6	4	4	2	50
Arkansas	10	7	14	17	9	14	13	7	12	6	14	17	140
California	20	23	30	22	22	23	28	31	28	40	29	32	328
Colorado	7	3	6	15	11	5	11	9	6	4	7	3	87
Connecticut	4	2	3	---	2	1	1	4	2	2	1	---	22
Delaware	3	---	2	3	---	2	4	1	---	1	---	4	21
District of Columbia	---	---	---	---	1	1	2	---	1	---	2	---	7
Florida	29	27	27	17	23	18	33	36	22	15	21	40	308
Georgia	49	26	31	22	38	27	32	34	31	27	33	33	363
Hawaii	---	---	---	---	---	---	---	---	---	---	---	---	---
Idaho	5	---	6	3	5	3	4	11	8	11	15	9	80
Illinois	140	114	122	97	94	81	83	87	76	80	81	93	1,148
Indiana	48	39	43	20	23	36	31	21	24	37	35	37	394
Iowa	36	34	26	23	30	26	35	57	29	37	43	50	426
Kansas	22	22	16	13	10	16	31	17	17	21	23	7	215
Kentucky	32	34	22	36	32	40	42	38	42	33	44	37	432
Louisiana	19	23	13	14	17	19	16	25	20	13	21	29	229
Maine	5	5	3	6	7	3	4	4	6	5	1	1	50
Maryland	15	7	16	9	12	9	7	7	7	16	13	10	128
Massachusetts	4	2	3	7	3	5	2	2	5	2	6	4	45
Michigan	31	26	35	22	20	28	26	12	24	35	22	47	328
Minnesota	31	17	19	21	21	30	21	24	20	23	27	24	278
Mississippi	18	19	23	9	19	14	13	9	7	16	15	24	186
Missouri	24	18	21	10	25	16	22	12	16	22	15	33	234
Montana	5	2	13	10	6	6	11	10	16	13	9	17	118
Nebraska	13	13	21	17	16	13	22	21	22	20	14	15	207
Nevada	4	1	4	2	1	1	1	5	1	5	1	1	34
New Hampshire	1	1	---	---	2	1	1	---	---	2	---	2	13
New Jersey	5	8	8	5	3	9	5	6	6	6	7	6	74
New Mexico	3	2	2	2	2	5	6	4	3	1	3	2	35
New York	35	30	32	22	30	27	28	26	25	24	40	32	351
North Carolina	14	10	24	20	10	18	20	23	8	23	15	21	206
North Dakota	11	6	2	5	4	4	3	11	3	6	8	5	68
Ohio	44	30	38	34	39	25	59	36	34	48	59	64	510
Oklahoma	18	12	15	15	18	13	17	7	11	13	12	11	162
Oregon	7	3	7	5	4	10	7	14	10	12	10	10	100
Pennsylvania	56	57	48	55	56	45	36	39	42	68	77	61	640
Rhode Island	---	2	1	---	---	---	---	---	---	1	---	---	5
South Carolina	9	6	9	8	9	2	6	6	4	11	8	9	87
South Dakota	12	7	6	10	9	10	6	9	4	10	9	7	99
Tennessee	21	20	24	25	24	23	17	29	24	28	32	30	297
Texas	55	45	55	54	48	55	52	39	44	48	40	44	579
Utah	3	4	3	2	4	5	6	7	---	4	5	5	48
Vermont	---	---	1	---	---	---	3	---	---	---	1	---	5
Virginia	17	7	11	12	14	10	14	9	9	8	17	15	143
Washington	16	14	18	24	25	21	15	20	21	14	27	30	245
West Virginia	14	13	10	22	11	12	13	6	16	15	10	12	154
Wisconsin	30	20	17	26	20	13	22	22	19	18	22	29	258
Wyoming	7	3	12	6	8	10	6	15	4	8	12	10	101
Unknown	---	---	---	---	---	---	---	---	---	---	---	---	---
TOTAL.....	993	796	907	796	809	778	873	841	757	877	939	996	10,362

TABLE 123-B RAPID TRANSIT ACCIDENTS BY STATE, BY MONTH 1977

State	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Total
California	2	1	1	---	---	---	---	1	1	---	1	---	7
Connecticut	---	---	---	---	---	---	---	---	---	---	---	---	---
Delaware	---	---	---	---	---	---	---	---	---	---	---	---	---
District of Columbia	---	---	---	---	1	---	2	---	1	---	---	---	4
Illinois	6	2	2	2	1	2	1	1	---	1	---	---	19
Massachusetts	1	1	---	1	---	---	---	---	---	---	---	1	4
New Jersey	---	---	---	---	1	---	---	---	---	---	---	---	2
New York	3	---	2	1	---	---	1	2	2	1	3	3	18
Ohio	2	---	---	---	---	1	---	---	---	---	---	1	4
Pennsylvania	---	1	---	---	---	---	---	---	---	---	---	---	2
Unknown	---	---	---	---	---	---	---	---	---	---	---	---	---
TOTAL.....	14	5	5	4	3	4	4	4	4	3	5	5	60

TABLE 124 ACCIDENTS INVOLVING CONSISTS
TRANSPORTING HAZARDOUS MATERIALS, BY STATE
CLASS I AND CLASS II RAILROADS, 1977

State	Consists In hazmat Accidents	Total Cars in Consist	Total cars Containing Hazmat	Total cars Damaged W/hazmat	Total cars Releasing Hazmat	People Evacuated	Equipment Dollar Damages
Alabama	20	1,299	94	24	2	200	1,448,875
Alaska	---	---	---	---	---	---	---
Arizona	8	476	28	16	9	20	793,200
Arkansas	13	1,020	60	24	6	165	765,656
California	38	2,768	176	21	4	9	2,549,663
Colorado	3	116	9	1	---	---	72,075
Connecticut	---	---	---	---	---	---	---
Delaware	2	66	2	1	---	---	96,650
District of Columbia	---	---	---	---	---	---	---
Florida	8	634	121	36	9	2,500	660,009
Georgia	12	897	36	16	5	250	3,251,393
Hawaii	---	---	---	---	---	---	---
Idaho	18	1,367	55	9	---	---	468,566
Illinois	99	6,860	427	96	24	1,004	2,526,820
Indiana	28	2,107	104	26	4	10	2,438,390
Iowa	21	1,461	74	22	5	700	617,136
Kansas	14	714	55	26	---	---	192,385
Kentucky	31	2,326	200	41	5	2,530	1,344,338
Louisiana	62	4,307	445	79	8	1,078	1,494,949
Maine	17	1,374	48	4	2	90	434,350
Maryland	5	266	30	6	2	---	68,725
Massachusetts	7	490	75	9	---	---	199,600
Michigan	23	1,117	61	25	9	2,002	337,987
Minnesota	26	1,623	184	15	1	---	290,413
Mississippi	32	2,896	137	66	6	---	2,098,842
Missouri	22	1,700	64	24	3	500	1,045,400
Montana	5	132	19	12	---	180	301,140
Nebraska	14	905	44	8	2	800	511,125
Nevada	6	401	15	4	1	---	72,317
New Hampshire	5	178	6	2	---	1,000	58,390
New Jersey	7	372	21	21	2	---	200,750
New Mexico	7	581	13	2	---	---	114,950
New York	7	509	14	8	3	30	227,550
North Carolina	14	1,205	46	21	3	---	1,073,171
North Dakota	7	307	36	4	---	---	57,035
Ohio	30	2,182	93	35	9	250	760,715
Oklahoma	19	1,199	104	46	6	108	1,474,372
Oregon	6	440	11	4	---	---	214,650
Pennsylvania	34	2,734	155	36	8	---	848,860
Rhode Island	2	74	4	2	---	---	5,000
South Carolina	2	198	2	2	---	---	15,684
South Dakota	---	---	---	---	---	---	---
Tennessee	36	2,295	130	67	5	75	1,272,073
Texas	84	5,999	387	135	20	4	3,578,855
Utah	1	77	8	---	---	---	4,413
Vermont	1	47	3	---	---	---	2,344
Virginia	20	1,734	47	15	---	---	705,776
Washington	8	487	101	20	2	---	55,243
West Virginia	8	498	23	14	5	600	635,450
Wisconsin	32	2,400	81	27	3	---	1,021,114
Wyoming	---	---	---	---	---	---	---
Unknown	---	---	---	---	---	---	---
Total.....	864	60,838	3,848	1,072	173	14,105	36,406,399

TABLE 125 ACCIDENTS INVOLVING CONSISTS
TRANSPORTING HAZARDOUS MATERIALS, BY TYPE OF ACCIDENT
CLASS I AND CLASS II RAILROADS, 1977

Type of Accident	Consists In hazmat Accidents	Total Cars in Consist	Total cars Containing Hazmat	Total cars Damaged W/hazmat	Total cars Releasing Hazmat	People Evacuated	Equipment Dollar Damages
Derailment	673	50,007	3,118	949	153	10,696	29,670,284
Head on collision	5	131	14	2	---	---	19,050
Rear end collision	13	671	41	4	1	9	181,549
Side collision	82	3,515	246	62	7	702	2,937,833
Raking collision	15	732	30	9	1	---	44,435
Broken train collision	7	464	26	4	4	600	657,100
Rail-hwy crossing	22	1,786	98	25	4	2,088	2,361,081
RR Grade crossing	---	---	---	---	---	---	---
Obstruction	---	---	---	---	---	---	---
Explosion-detonation	2	41	2	2	---	---	13,500
Fire or violent rupture	22	1,842	103	2	1	---	308,148
Other	23	1,649	170	13	2	10	213,419
Total	864	60,838	3,848	1,072	173	14,105	36,406,399

TABLE 131-A CASUAL
BY CLASS OF EMPLOYEE

Class of Person	Total			Total			Total		
	Kld	Rapid Inj	Ill	Kld	Class I & II Inj	Ill	Kld	Total Inj	
I.—EXECUTIVES, OFFICIALS, AND STAFF ASSISTANTS									
EXECUTIVE, GENERAL OFFICERS, AND ASSISTANTS.....	---	2	---	---	21	---	---	---	16
DIVISION OFFICERS, ASSISTANTS, AND STAFF ASSISTANT.....	---	9	---	3	118	4	3	---	114
Subtotal.....	---	11	---	3	139	4	3	---	130
II.—PROFESSIONAL, CLERICAL, AND GENERAL									
PROFESSIONAL AND SUBPROFESSIONAL ASSISTANTS.....	---	47	---	---	66	1	---	---	65
SUPERVISORY OR CHIEF CLERKS (MAJOR DEPARTMENTS).....	1	15	---	---	39	1	---	---	32
CHIEF CLERKS (MINOR DEPARTMENTS) AND ASSISTANTS.....	---	2	---	---	27	1	---	---	27
CLERKS AND CLERICAL SPECIALISTS.....	---	34	1	---	127	5	---	---	116
CLERKS.....	---	10	---	1	913	23	1	---	634
MECHANICAL DEVICE OPERATORS (OFFICE).....	---	4	---	---	23	1	---	---	22
STENOGRAPHERS AND SECRETARIES.....	---	---	---	---	19	1	---	---	19
STENOGRAPHERS AND TYPISTS.....	---	7	---	---	34	---	---	---	31
STOREKEEPERS, SALES AGENTS, AND BUYERS.....	---	1	---	---	34	4	---	---	30
TICKET AGENTS AND ASSISTANT TICKET AGENTS.....	---	101	1	---	43	---	---	---	42
TRAVELING AUDITORS OR ACCOUNTANTS.....	---	---	---	1	3	---	1	---	4
TELEPHONE SWITCHBOARD OPERATORS AND OFFICE ASSIST.....	---	---	---	---	9	1	---	---	9
MESSENGERS AND OFFICE BOYS.....	---	1	---	---	36	---	---	---	31
ELEVATOR OPERATORS AND OTHER OFFICE ATTENDANTS.....	---	---	---	---	4	---	---	---	4
LIEUTENANTS AND SERGEANTS OF POLICE.....	---	66	---	1	73	---	1	---	69
PATROLMEN AND WATCHMEN.....	---	536	---	---	311	10	---	---	263
TRAFFIC AND VARIOUS OTHER AGENCIES, INSPECTORS, ETC.....	---	3	1	---	25	---	---	---	24
CLAIM AGENTS OR INVESTIGATORS.....	---	2	---	---	6	---	---	---	5
FREIGHT CLAIM AGENTS OR INVESTIGATORS.....	---	---	---	---	13	---	---	---	12
CHIEF CLAIM AGENTS OR INVESTIGATORS.....	---	---	---	---	3	---	---	---	3
MISCELLANEOUS TRADE WORKERS (OTHER THAN PLUMBERS).....	---	96	2	---	45	---	---	---	36
MOTOR VEHICLE AND MOTOR CAR OPERATORS.....	---	9	---	1	405	13	1	---	375
TEAMSTERS AND STABLEMEN.....	---	---	---	---	1	---	---	---	---
JANITORS AND CLEANERS.....	---	59	1	---	116	2	---	---	104
Subtotal.....	1	993	6	4	2,377	63	4	2,197	
III.—MAINTENANCE OF WAY AND STRUCTURE									
ROADMASTERS, GENERAL FOREMAN, AND ASSISTANTS.....	---	42	---	---	156	4	---	---	146
MAINTENANCE OF WAY AND SCALE INSPECTORS.....	---	---	---	---	56	2	---	---	58
BRIDGE AND BUILDING GANG FOREMEN (SKILLED LABOR).....	---	---	---	---	119	3	---	---	110
BRIDGE AND BUILDING CARPENTERS.....	---	13	---	2	856	28	2	---	804
BRIDGE AND BUILDING IRONWORKERS.....	---	8	---	---	99	7	---	---	76
BRIDGE AND BUILDING PAINTERS.....	---	4	---	---	73	9	---	---	63
PAVING, BRICKLAYERS, PLASTERERS, AND PLUMBERS.....	---	4	---	---	364	11	---	---	354
MAINTENANCE OF WAY/STRUCTURE HELPERS & ASSISTANTS.....	---	274	10	---	669	18	---	---	584
PORTABLE STEAM EQUIPMENT OPERATORS.....	---	---	---	3	1,491	56	3	---	1,472
PORTABLE STEAM EQUIPMENT OPERATOR HELPERS.....	---	---	---	---	55	---	---	---	54
PUMPING EQUIPMENT OPERATORS.....	---	---	---	---	17	---	---	---	16
GANG FOREMEN (GANG AND FORK-TRAIN LABORERS).....	---	---	---	1	217	6	1	---	217
GANG FOREMEN (BRIDGE AND BUILDING, SIGNAL ETC).....	---	1	---	---	39	1	---	---	38
GANG OR SECTION FOREMEN.....	---	7	---	2	1,057	32	2	---	958
EXTRA GANG MEN.....	---	9	---	7	3,725	142	7	3,644	
SECTION MEN.....	---	124	---	11	8,690	405	9	7,782	
MAINTENANCE OF WAY LABORERS (OTHER THAN TRACK/BDW).....	---	283	4	---	353	13	---	---	320
GENERAL & ASSIST GEN FOREMEN/INSPECTORS (SIGNAL ETC).....	---	---	---	---	57	---	---	---	57
GANG FOREMEN (SIGNAL AND TELEGRAPH SKILLED TRADES).....	---	2	---	1	65	7	---	---	64
SIGNALMEN AND SIGNAL MAINTAINERS.....	---	37	---	1	678	47	1	657	
LINEMEN AND GROUNDMEN.....	---	18	---	1	306	30	1	301	
ASSISTANT SIGNALMEN AND ASSISTANT SIGNAL MAINT.....	---	1	---	1	412	36	1	404	
SIGNALMEN AND SIGNAL MAINTAINER HELPERS.....	---	6	---	1	154	16	1	151	
Subtotal.....	---	842	14	31	19,717	875	26	18,336	
IV.—MAINTENANCE OF EQUIPMENT AND STORES									
GENERAL, ASSISTANT GENERAL, AND DEPARTMENT FOREMEN.....	---	25	---	---	146	1	---	---	161
GENERAL AND ASSISTANT GENERAL FOREMEN (STORES).....	---	---	---	---	13	---	---	---	12
EQUIPMENT, SHOP, ELEC. MATERIAL, & SUPPLIES INSPTR.....	---	251	2	---	101	1	---	---	93
GANG FOREMEN AND GANG LEADERS (SKILLED LABOR).....	---	10	---	---	215	3	---	---	207
BLACKSMITHS.....	---	14	---	---	144	4	---	---	176
BOILERMAKERS.....	---	1	---	---	341	10	---	---	332
CARMEN (A AND B).....	---	173	1	1	3,460	49	1	3,170	
CARMEN (C AND D).....	---	1	---	2	3,197	74	2	3,075	
ELECTRICAL WORKERS (A).....	---	157	3	---	1,120	31	---	---	1,077
ELECTRICAL WORKERS (B).....	---	12	---	---	56	2	---	---	54
ELECTRICAL WORKERS (C).....	---	24	---	---	31	1	---	---	31
MACHINISTS.....	---	101	---	---	2,636	91	---	---	2,636
MOLDERS.....	---	---	---	---	3	---	---	---	3
SHEET-METAL WORKERS.....	---	1	---	---	595	31	---	---	564
SKILLED TRADES HELPERS (M OF E AND STORES).....	---	20	---	---	792	4	---	---	783
HELPER APPRENTICES (M OF E AND STORES).....	---	5	---	---	164	5	---	---	164
REGULAR APPRENTICES (M OF E AND STORES).....	---	6	---	---	469	7	---	---	463
COACH CLEANERS.....	---	102	12	---	308	12	---	---	261
GANG FOREMEN (SHOPS, ENGINE HOUSES, & POWER PLANTS).....	---	---	---	---	53	2	---	---	49
GANG FOREMEN (STORES AND ICE, RECLAMATION, ETC).....	---	1	---	---	15	---	---	---	15
CLASSIFIED LABORERS (SHOPS, ENGINE HOUSES, ETC).....	---	43	---	1	566	27	1	562	
GENERAL LABORERS (SHOP, ENGINE HOUSES, ETC).....	---	76	5	2	863	44	2	802	
GENERAL LABORERS (STORES AND ICE, RECLAMATION, ETC).....	---	---	---	---	401	6	---	---	395
STATIONARY ENGINEERS (STEAM).....	---	3	---	---	24	2	---	---	24
STATIONARY FIREMEN, OILERS, COAL PASSERS, AND ETC.....	---	---	---	---	23	---	---	---	20
Subtotal.....	---	1,031	23	6	15,736	412	6	14,804	
V.—TRANSPORTATION									
CHIEF TRAIN DISPATCHERS.....	---	---	---	---	1	---	---	---	1
TRAIN DISPATCHERS.....	1	6	---	---	10	---	---	---	10
TRAIN DIRECTORS.....	---	1	---	---	12	---	---	---	9
STATION AGENTS (SUPERVISORY, MAJOR STATIONS).....	---	16	---	---	16	---	---	---	14
STATION AGENTS (SMALLER STATIONS, MONTHLY CLERKS).....	---	285	1	---	16	1	---	---	15
STATION AGENTS (TELEGRAPHERS AND TELEPHONERS).....	---	1	---	---	33	---	---	---	33
CHIEF TELEGRAPHERS AND TELEPHONERS OR WIRE CHIEFS.....	---	---	---	---	2	---	---	---	2
CLERK-TELEGRAPHERS AND CLERK-TELEPHONERS.....	---	---	---	---	54	---	---	---	51

RIES IN RAILROAD ACCIDENTS
E, AND BY CLASS OF ACCIDENT
1977

Ill	Man Hours (000)	Casualties per mill man-hrs		Class I Railroads (Line-Haul)		Train Accidents		Train Incidents		Nontrain Incidents	
		Kilg	Ill	Kilg	Ill	Kilg	Ill	Kilg	Ill	Kilg	Ill
---	12,833	---	1.25	---	---	---	---	3	---	---	13
4	23,308	.13	4.85	.17	2	1	---	8	---	1	105
4	36,141	.08	3.60	.11	2	1	---	11	---	1	118
1	19,270	---	3.37	.05	---	---	---	2	---	---	63
1	4,720	---	6.78	.21	---	---	---	1	---	---	31
1	15,898	---	1.70	.06	---	---	---	---	---	---	27
5	15,115	---	7.67	.33	---	---	---	---	1	---	116
22	86,374	.01	9.89	.25	---	1	---	29	---	1	824
1	8,173	---	2.69	.12	---	---	---	---	---	---	22
1	5,932	---	3.20	.17	---	---	---	---	---	---	19
---	8,988	---	3.46	---	---	---	---	1	---	---	30
4	3,081	---	9.74	1.30	---	---	---	1	---	---	29
---	328	---	128.05	---	---	---	---	3	---	---	39
---	1,314	.76	2.28	---	---	---	---	---	1	---	3
1	1,490	---	6.04	.67	---	---	---	---	---	---	9
---	1,009	---	29.55	---	---	---	---	1	---	---	30
---	221	---	18.10	---	---	---	---	---	---	---	4
---	2,562	.39	26.93	---	---	---	---	10	---	1	59
10	5,099	---	55.50	1.96	---	---	---	9	---	---	274
---	10,192	---	2.35	---	---	---	---	2	---	---	22
---	1,293	---	3.67	---	---	---	---	1	---	---	4
---	689	---	14.13	---	---	---	---	---	---	---	12
---	355	---	8.45	---	---	---	---	---	---	---	3
---	201	---	179.10	---	---	---	---	2	---	---	34
13	10,703	.09	35.04	1.21	---	---	1	8	1	---	367
---	74	---	13.51	---	---	---	---	1	---	---	103
2	4,174	---	24.92	.48	---	---	---	1	---	---	2
62	207,415	.02	10.59	.30	---	1	---	1	72	2	3
---	---	---	---	---	---	---	---	---	---	---	2,124
4	7,169	---	20.37	.56	---	1	---	---	---	---	137
2	2,267	---	25.58	.88	---	2	---	8	1	---	46
3	3,974	---	27.68	.75	---	2	---	7	---	---	108
28	8,404	.24	95.67	3.33	---	2	---	12	---	2	790
7	793	---	95.84	8.63	---	---	---	---	---	---	76
4	830	---	75.90	9.64	---	---	---	1	---	---	62
11	5,964	---	59.36	1.84	---	---	---	11	---	---	343
17	5,185	---	113.51	3.30	---	---	---	15	---	---	568
56	27,348	.11	53.82	2.05	---	3	---	2	96	1	1,373
---	542	---	99.63	---	---	---	---	5	---	1	49
---	62	---	199.12	---	---	---	---	---	---	---	16
---	8,915	.11	24.34	.67	---	1	---	---	---	1	206
1	136	---	279.41	7.35	---	---	---	3	---	---	35
31	15,826	.13	60.53	1.96	---	4	---	1	58	1	1
139	30,259	.23	120.43	4.39	---	4	---	3	135	1	4
396	42,464	.21	183.26	9.33	---	7	---	4	255	4	5
13	731	---	437.76	17.78	---	2	---	---	---	---	303
---	3,471	---	16.42	---	---	---	---	15	---	---	52
6	3,428	---	18.67	1.75	---	---	---	1	---	---	63
44	14,557	.07	45.13	3.02	---	---	---	12	---	1	645
30	4,505	.22	66.81	6.66	---	---	---	1	---	1	292
36	3,556	.28	113.61	10.12	---	---	---	1	5	---	399
17	847	1.18	178.28	20.07	---	---	---	1	1	---	150
855	191,213	.15	95.86	4.47	---	26	---	12	669	8	16
---	---	---	---	---	---	---	---	---	---	---	17,635
1	11,787	---	13.66	.08	---	2	---	11	---	---	148
---	334	---	35.93	---	---	---	---	1	---	---	11
1	996	---	93.19	1.00	---	---	---	3	---	---	90
3	12,517	---	16.54	.24	---	---	---	6	---	---	201
4	2,050	---	86.83	1.95	---	---	---	2	---	---	176
10	3,169	---	104.76	3.16	---	2	---	1	---	---	329
47	19,577	.05	161.92	2.40	---	1	---	72	---	1	3,097
71	60,267	.03	51.02	1.18	---	1	---	73	---	2	3,001
30	21,282	---	50.61	1.41	---	1	---	22	---	---	1,034
4	1,808	---	29.87	1.11	---	---	---	2	---	---	52
1	307	---	100.98	3.26	---	---	---	---	---	---	31
86	35,651	---	75.68	2.41	---	1	---	23	1	---	2,674
---	35	---	85.71	---	---	---	---	---	---	---	3
31	9,647	---	58.46	3.21	---	---	---	5	---	---	559
7	6,451	---	69.91	1.09	---	---	---	5	---	---	446
5	776	---	215.21	6.44	---	---	---	1	---	---	166
9	6,386	---	72.50	1.10	---	---	---	7	---	---	456
9	4,425	---	58.98	2.03	---	---	---	7	---	---	254
2	549	---	89.25	3.64	---	---	---	---	---	---	49
---	714	---	21.01	---	---	---	---	---	---	---	15
26	8,668	.12	57.91	3.00	---	---	---	---	---	1	485
43	8,461	.24	94.79	5.08	---	---	---	2	17	1	775
8	4,660	---	84.76	1.72	---	---	---	12	---	---	303
2	767	---	31.29	2.61	---	---	---	---	1	---	24
---	462	---	43.29	---	---	---	---	---	---	---	20
396	221,748	.03	66.76	1.79	---	8	---	2	293	3	4
---	---	---	---	---	---	---	---	---	---	---	14,503
---	1,959	---	.51	---	---	---	---	1	---	---	---
---	4,653	---	2.15	---	---	---	---	---	---	---	10
---	567	---	15.87	---	---	---	---	---	---	---	9
---	2,708	---	5.17	---	---	---	---	---	---	---	14
1	3,172	---	4.73	.32	---	---	---	2	---	---	13
---	6,731	---	4.90	---	---	---	---	1	---	---	32
---	1,485	---	1.35	---	---	---	---	---	---	---	2
---	6,182	---	8.25	---	---	---	---	---	2	---	49

(CONT.)

TABLE 131-A CASUALTIES IN RAILROAD ACCIDENTS
BY CLASS OF EMPLOYEE, AND BY CLASS OF ACCIDENT
1977

Class of Person	Total Rapid Trans			Total Class I & II			Man Hours (000)	Casualties per mill man-hrs			Class I Railroads (Line-Haul)			Train Incidents			Nontrain Incidents		
	Kld	Inj	Ill	Kld	Inj	Ill		Kld	Inj	Ill	Kld	Inj	Ill	Kld	Inj	Ill	Kld	Inj	Ill
V.--TRANSPORTATION (CONT.)																			
TELEGRAPHERS, TELEPHONERS, AND TOWERMEN.....	6	---	---	96	4	---	92	4	11,962	7.69	.33	---	---	---	5	1	---	47	3
STATIONMASTERS AND ASSISTANTS.....	6	---	---	3	---	---	3	---	192	15.63	---	---	---	---	---	---	3	---	---
SUPERVISING BAGGAGE AGENTS.....	---	---	---	2	---	---	2	---	21	95.24	---	---	---	---	---	---	2	---	---
BAGGAGE AGENTS AND ASSISTANTS.....	---	---	---	11	---	---	11	---	88	125.00	---	---	---	---	---	---	1	---	---
BAGGAGE, PARCEL ROOM, AND STATION ATTENDANTS.....	1	---	---	76	1	---	74	1	2,202	33.61	.45	---	---	---	2	---	72	1	
GENERAL FOREMEN (FREIGHT STATIONS, WAREHOUSES, ETC.)...	---	---	---	4	---	---	3	---	20	20.55	---	---	---	---	---	---	3	---	---
ASST. GENERAL FOREMAN (FRY STATIONS, WAREHOUSES).....	---	---	---	2	---	---	2	---	88	22.73	---	---	---	---	---	---	2	---	---
GANG FOREMEN (FREIGHT STATION, WAREHOUSE, ETC.).....	---	---	---	8	---	---	8	---	443	18.06	---	---	---	---	---	---	8	---	---
CALLERS, LOADERS, SEALERS, SCALERS, ETC.....	12	---	---	49	1	---	45	1	885	50.45	1.13	---	---	---	1	---	44	1	
TRUCKERS (STATIONS, WAREHOUSES, AND PLATFORMS).....	3	---	---	146	---	---	85	---	534	159.18	---	---	---	---	---	---	64	---	---
LABORERS (COAL AND ORE DOCKS AND GRAIN ELEVATORS)....	---	---	---	86	---	---	82	---	1,110	73.87	---	---	---	---	---	---	60	---	---
COMMON LABORERS (STATIONS, WAREHOUSES, PLATFORMS)...	1	129	5	104	1	---	80	1	833	96.00	1.20	---	---	---	4	---	76	1	---
STEWARD, RESTAURANT & LODGING-HOUSE MANAGERS, ETC.	---	---	---	33	1	---	33	1	436	75.69	2.29	---	3	---	16	---	14	1	---
CHEFS AND COOKS (RESTAURANTS OR DINING CARS).....	---	---	---	95	7	---	95	7	955	99.48	7.33	---	4	---	44	6	47	1	---
WAITERS, CAMP COOKS, KITCHEN HELPERS, ETC.....	---	---	---	94	1	---	94	1	4,184	22.47	.24	---	---	---	19	---	71	1	---
OFFICERS, WORKERS, ATTENDANTS ON BARGES, LAUNCHES....	---	---	---	45	---	---	43	---	958	44.89	---	---	---	---	1	---	42	---	---
TRANSPORTATION AND DINING-SERVICE INSPECTORS.....	---	---	---	2	---	---	2	---	457	4.38	---	---	---	---	---	---	2	---	---
PARLOR AND SLEEPING CAR CONDUCTORS.....	---	---	---	1	---	---	1	---	---	---	---	---	---	---	---	---	---	---	---
TRAIN ATTENDANTS.....	6	---	---	269	6	---	269	8	1,772	151.81	4.51	---	24	---	130	6	115	2	---
BRIDGE OPERATORS AND HELPERS.....	---	---	---	22	1	---	20	1	1,314	15.22	.76	---	---	---	---	---	20	1	---
CROSSING AND BRIDGE FLAGMEN AND GATEMEN.....	---	---	---	12	---	---	12	---	1,283	9.35	---	---	---	---	3	---	9	---	---
FOREMEN (LAUNDRY) AND LAUNDRY WORKERS.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
Subtotal.....	2	477	6	1,302	26	---	1,191	26	57,320	20.78	.45	35	---	236	13	---	920	13	---
VI.--(a) TRANSPORTATION																			
YARDMASTERS.....	2	---	---	111	2	1	96	2	10,455	10	9.18	.19	---	1	10	---	86	1	---
ASSISTANT YARDMASTERS.....	---	---	---	5	1	---	4	1	491	8.15	2.04	---	---	---	---	---	4	1	---
SWITCH TENDERS.....	---	---	---	34	---	---	24	---	693	34.63	---	---	---	---	---	---	20	---	---
OUTSIDE HOSTLERS.....	1	---	---	176	7	1	158	5	3,338	47.33	1.50	---	2	---	25	1	131	4	---
INSIDE HOSTLERS.....	---	---	---	86	---	---	76	---	2,003	37.94	---	---	---	---	---	---	67	2	---
OUTSIDE HOSTLERS HELPERS.....	---	---	---	85	2	---	74	2	1,477	50.10	1.35	---	---	---	10	---	64	2	---
Subtotal.....	7	---	---	497	12	2	432	10	18,457	23.41	.58	---	2	1	58	1	372	8	---
VI.--(b) TRANSPORTATION (Train and engine)																			
ROAD PASSENGER CONDUCTORS.....	382	3	---	142	4	---	139	4	3,317	41.91	1.21	---	3	---	61	2	75	2	---
ASSIST. ROAD PASSENGER CONDUCTORS & TICKET COLLECTO.	2	---	---	144	6	---	142	6	3,791	37.46	1.58	---	---	---	66	---	76	---	---
ROAD FREIGHT CONDUCTORS (THROUGH FREIGHT).....	---	---	---	3	1,031	27	3	1,017	17,091	18	59.51	1.58	2	72	3	59	1	361	12
ROAD FREIGHT CONDUCTORS (LOCAL AND WAY FREIGHT)....	---	---	---	7	848	12	7	803	15,040	47	53.39	.80	---	37	---	6	378	4	1
ROAD PASSENGER BAGGAGEMEN.....	---	---	---	15	---	---	15	---	462	32.47	---	---	---	1	---	---	10	---	---
ROAD PASSENGER BRAKEMEN AND FLAGMEN.....	4	---	---	186	2	1	161	2	1,260	79	127.78	1.59	---	7	---	1	61	1	93
ROAD FREIGHT BRAKEMEN AND FLAGMEN (THROUGH FREIGHT)...	---	---	---	16	2,531	49	15	2,496	33,986	44	73.49	1.44	5	162	1	9	1,186	15	1
ROAD FREIGHT BRAKEMEN AND FLAGMEN (LOCAL & WAY FREI.)	---	---	---	7	2,868	59	6	2,755	29,459	20	93.52	1.97	---	74	---	2	1,181	250	31
YARD CONDUCTORS AND YARD FOREMEN.....	3	---	---	1,823	34	11	1,512	24	33,654	33	44.93	.71	---	20	1	11	555	4	---
YARD BRAKEMEN AND YARD HELPERS.....	36	---	---	17,200	106	13	6,146	89	62,743	21	97.99	1.42	3	35	1	9	2,418	35	1
ROAD PASSENGER ENGINEERS AND MOTORMEN.....	313	3	---	115	9	1	113	9	3,470	29	32.56	2.59	1	6	---	44	7	63	2
ROAD FREIGHT ENGINEERS AND MOTORMEN (THROUGH FREIGHT)...	---	---	---	4	635	29	3	629	18,701	16	33.63	1.55	3	68	3	---	236	16	---
ROAD FREIGHT ENGINEERS & MOTORMEN (LOCAL & WAY FREI.)	1	---	---	517	17	---	498	15	14,675	---	33.34	1.01	---	40	---	22	10	---	---
YARD ENGINEERS AND MOTORMEN.....	1	26	---	1	840	31	1	714	31,137	.03	22.93	.80	1	22	---	334	14	358	11
ROAD PASSENGER FIREMEN AND HELPERS.....	---	---	---	59	5	---	58	5	1,648	35.19	3.03	---	7	---	26	4	25	1	---
ROAD FREIGHT FIREMEN AND HELPERS (THROUGH FREIGHT)...	---	---	---	170	9	---	166	9	4,917	33.76	1.83	---	14	---	70	5	42	4	---
ROAD FREIGHT FIREMEN & HELPERS (LOCAL & WAY FREI.)...	---	---	---	105	5	---	99	5	3,501	28.28	1.43	---	2	6	---	47	46	3	3
YARD FIREMEN AND HELPERS.....	---	---	---	207	8	---	168	7	5,951	28.23	1.18	---	8	1	---	62	2	98	4
Subtotal.....	1	773	6	68	19,450	412	61	17,631	284,983	.21	61.87	1.32	15	582	12	43	7,497	153	3
TOTAL.....	4	4,134	55	114	59,224	1,804	104	54,715	1,017,277	.10	53.79	1.70	17	655	13	59	8,436	180	28

TABLE 131-B CASUALTIES IN RAILROAD ACCIDENTS
RAPID TRANSIT CARRIERS - 1977

Class of Person	Total.....		Man Hours (000)	Casualties Per Mill Man-Hrs		Train-Accident		Train-Incident		Nontrain...	
	Kill	Inj		Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj
EMPLOYEES ON DUTY	4	4,189	81,374	.05	51.48	1	23	2	299	1	3,667
OTHERS	66	3,492	*	*	*	11	207	41	573	14	2,712
TOTAL	70	7,681	*	*	*	12	230	43	872	15	6,579

*Note: Manhour figures are not available.

TABLE 131-C CASUALTIES IN RAILROAD ACCIDENTS
BY CLASS OF PERSON, AND BY CLASS OF ACCIDENT
1977

Class of Person	Rapid Transit		Total Class I and II		Total		Total All Class I Railroads		Train-Accident		Train-Incident		NonTrain	
	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj
EMPLOYEES NOT ON DUTY	---	3	2	615	2	606	---	7	---	581	2	18	---	---
PASSENGERS ON TRAINS	17	1,163	4	503	3	497	---	76	---	193	---	228	---	---
NONRESPASSERS	12	2,086	952	5,032	921	4,841	81	170	819	587	21	4,084	---	---
TRESPASSERS	37	240	458	689	448	663	6	16	414	77	26	570	---	---
TOTAL....	66	3,492	1,416	6,839	1,374	6,607	87	269	1,236	1,438	54	4,900	---	---

TABLE 132-A NATURE OF TRAIN ACCIDENT AND TRAIN INCIDENT FATALITIES, BY CLASS OF PERSON
CLASS I AND II RAILROADS, 1977

	 Train Accidents				 Train Incidents										Total	Total
	Coll	Derail	Other	Total	Coup- ling	Operating.....	Fixed	Getting	Grade	Struck/	object*	on/off	xings	run over	Misc	
EMPLOYEES																
Total Groups I-V																
Groups I-V	---	---	2	2	---	---	---	1	---	1	6	8	16	18		
SUBTOTAL I-V	---	---	2	2	---	---	---	1	---	1	6	8	16	18		
VI.--- (a) Transportation (Yardmasters, switch tenders, and hostlers)																
Yardmasters	---	---	---	---	---	---	---	---	---	---	1	---	1	1		
SUBTOTAL VI. (a)	---	---	---	---	---	---	---	---	---	---	1	---	1	1		
VI.--- (b) Transportation (train and engine)																
Rd frt cond (Thru)	---	---	2	2	---	---	---	---	---	---	1	---	1	3		
Rd frt cond (Local)	---	---	---	---	---	---	1	---	---	2	1	1	6	6		
Rd pass brakemen	---	---	---	---	---	---	---	---	---	---	1	---	1	1		
Rd frt brakemen (T)	1	1	4	6	1	---	2	---	---	---	4	2	9	15		
Rd frt brakemen (L)	---	---	---	---	2	---	---	---	2	---	1	2	7	7		
Yard conductors	---	---	---	---	2	---	---	---	4	---	3	2	11	11		
Yard brakemen	3	---	---	3	4	---	---	---	3	---	1	5	13	16		
Rd pass engineers	---	---	1	1	---	---	---	---	---	---	---	---	---	1		
Rd frt engineers (T)	---	2	2	4	---	---	---	---	---	---	---	---	---	4		
Yard engineers	---	1	---	1	---	---	---	---	---	---	---	---	---	1		
SUBTOTAL VI. (b)	4	6	7	17	9	---	3	---	4	7	2	11	12	48	65	
TOTAL EMPLOYEES	4	6	9	19	9	---	3	---	5	7	3	18	20	65	84	
NON-EMPLOYEES																
Non-employees																
Passengers	---	---	---	---	---	---	---	---	2	---	---	2	4	4		
Non trespassers	---	2	81	83	---	---	---	---	---	793	52	2	847	930		
Trespassers	---	---	6	6	---	---	---	---	1	21	55	338	9	424	430	
SUBTOTAL Non Employees	---	2	87	89	---	---	---	---	1	23	848	390	13	1275	1364	
TOTAL NON-EMPLOYEES	---	2	87	89	---	---	---	---	1	23	848	390	13	1275	1364	
GRAND TOTAL...	4	8	96	108	9	---	3	---	6	30	651	408	33	1340	1448	

* Persons on locomotives or cars coming in contact with structures

TABLE 132-B NATURE OF TRAIN ACCIDENT AND TRAIN INCIDENT INJURIES, BY CLASS OF PERSON
CLASS I AND II RAILROADS, 1977

	 Train Accidents				 Train Incidents										Total	Total
	Coll	Derail	Other	Total	Coup- ling	Operating..... Locos	H Brks	Swch	Fixed object*	Getting on/off	Grade xings	Struck/ run over	Misc	Total		
EMPLOYEES																
Total Groups I-V																
Groups I-V	17	34	26	77	17	18	8	3	6	50	37	44	1171	1354	1431	
SUBTOTAL I-V	17	34	26	77	17	18	8	3	6	50	37	44	1171	1354	1431	
VI.--- (a) Transportation (Yardmasters, switch tenders, and hostlers)																
Yardmasters	---	---	1	1	1	---	1	---	1	3	---	---	4	10	11	
Switch tenders	---	---	---	---	1	1	1	---	---	1	---	---	---	4	4	
Outside hostlers	2	---	---	2	1	11	2	---	---	7	---	1	6	28	30	
Inside hostlers	---	---	---	---	---	5	1	---	---	1	---	---	2	9	9	
Hostler helpers	---	---	---	---	---	---	---	---	2	4	---	---	5	11	11	
SUBTOTAL VI. (a)	2	---	1	3	3	17	5	---	3	16	---	1	17	62	65	
VI.--- (b) Transportation (train and engine)																
Road pass conductor	---	---	3	3	1	---	---	---	3	4	3	---	51	62	65	
Asst road pass cond	---	---	---	---	1	1	1	---	3	3	---	---	58	66	66	
Rd frt cond (Thru)	11	56	6	73	16	18	9	---	11	109	7	2	419	591	664	
Rd frt cond (Local)	7	25	6	38	29	9	12	5	15	96	5	3	223	397	435	
Rd pass baggagemen	---	---	1	1	---	---	---	---	---	1	---	---	3	4	5	
Rd pass brakemen	2	1	4	7	6	6	---	---	3	3	1	---	46	65	72	
Rd frt brakemen (T)	47	93	23	163	41	32	17	11	23	349	13	7	667	1160	1323	
Rd frt brakemen (L)	19	42	15	76	112	22	68	16	39	455	10	12	509	1243	1319	
Yard conductors	15	7	5	27	109	13	21	12	41	204	2	10	249	661	688	
Yard brakemen	28	12	6	46	389	62	167	52	125	990	6	41	955	2787	2833	
Rd pass engineers	---	---	6	6	---	19	---	---	---	---	4	---	22	45	51	
Rd frt engineers (T)	28	20	20	68	5	124	---	---	---	13	4	1	90	237	305	
Rd frt engineers (L)	14	15	11	40	3	137	---	3	2	6	7	1	73	232	272	
Yard engineers	15	5	5	25	10	275	---	3	1	9	2	---	86	386	411	
Rd pass firemen	1	---	6	7	---	14	---	---	---	2	1	---	9	26	33	
Rd frt firemen (T)	7	4	3	14	2	29	---	---	2	4	2	---	34	73	87	
Rd frt firemen (L)	4	1	1	6	2	23	---	---	---	3	1	---	20	49	55	
Yard firemen	5	3	---	8	4	40	---	---	---	1	---	---	30	75	83	
SUBTOTAL VI. (b)	203	284	121	608	729	824	295	102	268	2252	68	77	3544	8159	8767	
Employees not on duty	---	7	---	7	1	---	1	---	---	4	2	4	7	19	26	
Employees not on duty	---	7	---	7	1	---	1	---	---	4	2	4	7	19	26	
SUBTOTAL Not on Duty	---	7	---	7	1	---	1	---	---	4	2	4	7	19	26	
TOTAL EMPLOYEES	222	325	148	695	750	859	309	105	277	2322	107	126	4739	9594	10289	
NON-EMPLOYEES																
Non-employees																
Passengers	5	44	27	76	---	---	---	---	---	55	4	4	169	232	308	
Nontrespassers	4	20	154	178	5	2	1	1	2	9	3974	213	47	4254	4432	
Trespassers	---	3	17	20	---	1	---	---	3	71	193	277	44	589	609	
SUBTOTAL Non Employees	9	67	198	274	5	3	1	1	5	135	4171	494	260	5075	5349	
TOTAL NON-EMPLOYEES	9	67	198	274	5	3	1	1	5	135	4171	494	260	5075	5349	
GRAND TOTAL...	231	392	346	969	755	862	310	106	282	2457	4278	620	4999	14669	15638	

* Persons on locomotives or cars coming in contact with structures

TABLE 132-C NATURE OF TRAIN ACCIDENT AND TRAIN INCIDENT FATALITIES, BY CLASS OF PERSON
RAPID TRANSIT CARRIERS, 1977

----- Train Accidents ---				----- Train Incidents -----										
Coll	Derail	Other	Total	Coup- ling	Locos	H Brks	Switch	object*	Fixed on/off	Getting xings	Grade run over	Struck/ Misc	Total	Total
EMPLOYEES														
Total Groups I-V														
Groups I-V	---	---	---	---	---	---	---	---	1	---	---	1	2	2
SUBTOTAL I-V	---	---	---	---	---	---	---	---	1	---	---	1	2	2
VI.--- (b) Transportation (train and engine)														
Yard engineers	1	---	---	1	---	---	---	---	---	---	---	---	---	1
SUBTOTAL VI.(b)	1	---	---	1	---	---	---	---	---	---	---	---	---	1
TOTAL EMPLOYEES	1	---	---	1	---	---	---	---	1	---	---	1	2	3
NON-EMPLOYEES														
Non-employees														
Passengers	11	---	---	11	---	---	---	---	---	---	2	4	6	17
Nontrespassers	---	---	---	---	---	---	---	---	---	---	2	---	2	2
Trespassers	---	---	---	---	---	---	---	---	---	---	32	1	33	33
SUBTOTAL Non-Employees	11	---	---	11	---	---	---	---	---	---	36	5	41	52
TOTAL NON-EMPLOYEES	11	---	---	11	---	---	---	---	---	---	36	5	41	52
GRAND TOTAL...														
	12	---	---	12	---	---	---	---	1	---	36	6	43	55

* Persons on locomotives or cars coming in contact with structures

TABLE 132-D NATURE OF TRAIN ACCIDENT AND TRAIN INCIDENT INJURIES, BY CLASS OF PERSON
RAPID TRANSIT CARRIERS, 1977

	 Train Accidents				 Train Incidents											
	Coll	Derail	Other	Total	Coup- ling	Locos	H Brks	Switch	object*	Fixed on/off	Getting xings	Grade run	Struck/ over	Misc	Total	Total
EMPLOYEES																
Total Groups I-V																
Groups I-V	6	---	1	7	---	---	---	2	---	2	1	2	55	62	69	
SUBTOTAL I-V	6	---	1	7	---	---	---	2	---	2	1	2	55	62	69	
VI.--- (b) Transportation (train and engine)																
Road pass conductor	7	---	1	8	---	1	---	---	1	1	---	1	129	133	141	
Asst road pass cond	---	---	---	---	---	---	---	---	---	1	---	---	1	2	2	
Yard brakemen	1	1	---	2	1	---	---	---	---	---	---	---	---	1	3	
Rd pass engineers	6	---	---	6	---	15	---	---	---	1	---	---	72	88	94	
Yard engineers	---	---	---	---	---	---	---	---	---	---	---	---	1	1	1	
SUBTOTAL VI. (b)	14	1	1	16	1	16	---	---	1	3	---	1	203	225	241	
Employees not on duty	---	---	---	---	---	---	---	---	---	---	---	---	1	1	1	
Employees not on duty	---	---	---	---	---	---	---	---	---	---	---	---	1	1	1	
SUBTOTAL Not on Duty	---	---	---	---	---	---	---	---	---	---	---	---	1	1	1	
TOTAL EMPLOYEES	20	1	2	23	1	16	---	2	1	5	1	3	259	288	311	
NON-EMPLOYEES																
Non-employees																
Passengers	204	---	---	204	---	---	---	---	1	112	---	2	373	488	692	
Nontrespassers	3	---	---	3	---	1	---	---	---	4	---	30	13	48	51	
Trespassers	---	---	---	---	---	---	---	---	---	---	1	31	4	36	36	
SUBTOTAL Non Employees	207	---	---	207	---	1	---	---	1	116	1	63	390	572	779	
TOTAL NON-EMPLOYEES	207	---	---	207	---	1	---	---	1	116	1	63	390	572	779	
GRAND TOTAL...	227	1	2	230	1	17	---	2	2	121	2	66	649	860	1090	

* Persons on locomotives or cars coming in contact with structures

TABLE 132-E NATURE OF TRAIN ACCIDENT AND TRAIN INCIDENT ILLNESSES, BY CLASS OF PERSON
CLASS I AND II RAILROADS, 1977

	Train Accidents				Train Incidents										Total	Total
	Coll	Derail	Other	Total	Coup- ling	Locos	Operating H Brks	Switch	Fixed object*	Getting on/off	Grade xings	Struck/ run over	Misc			
EMPLOYEES																
Total Groups I-V																
Groups I-V	---	---	---	---	---	---	---	---	---	---	2	---	25	27	27	
SUBTOTAL I-V	---	---	---	---	---	---	---	---	---	---	2	---	25	27	27	
VI.--- (a) Transportation (Yardmasters, switch tenders, and hostlers)																
Yardmasters	---	---	1	1	---	---	---	---	---	---	---	---	---	---	1	
Outside hostlers	---	---	---	---	---	1	---	---	---	---	---	---	---	1	1	
SUBTOTAL VI. (a)	---	---	1	1	---	1	---	---	---	---	---	---	---	1	2	
VI.--- (b) Transportation (train and engine)																
Road pass conductor	---	---	---	---	---	---	---	---	---	---	---	---	2	2	2	
Rd frt cond (Thru)	1	1	1	3	---	1	---	---	---	---	---	---	11	12	15	
Rd frt cond (Local)	---	---	---	---	---	---	---	---	---	---	---	---	4	4	4	
Rd pass brakemen	---	---	---	---	---	---	---	---	---	---	---	---	1	1	1	
Rd frt brakemen (T)	---	1	---	1	---	2	---	---	---	---	---	---	13	15	16	
Rd frt brakemen (L)	---	1	1	2	---	2	---	1	1	---	---	---	21	25	27	
Yard conductors	---	---	1	1	---	---	---	---	---	---	---	---	11	11	12	
Yard brakemen	---	---	1	1	1	1	1	1	---	---	---	---	41	45	46	
Rd pass engineers	---	---	---	---	---	6	---	---	---	---	---	---	1	7	7	
Rd frt engineers (T)	---	1	2	3	---	16	---	---	---	---	---	---	---	16	19	
Rd frt engineers (L)	---	---	---	---	---	4	---	---	---	---	---	---	2	6	6	
Yard engineers	---	---	---	---	---	12	---	---	---	---	---	---	6	18	18	
Rd pass firemen	---	---	---	---	---	4	---	---	---	---	---	---	---	4	4	
Rd frt firemen (T)	---	---	---	---	---	5	---	---	---	---	---	---	---	5	5	
Rd frt firemen (L)	---	---	---	---	---	---	---	---	---	---	---	---	2	2	2	
Yard firemen	---	---	1	1	---	2	---	---	---	---	---	---	---	2	3	
SUBTOTAL VI. (b)	1	4	7	12	1	55	1	2	1	---	---	---	115	175	187	
TOTAL EMPLOYEES	1	4	8	13	1	56	1	2	1	---	2	---	140	203	216	
NON-EMPLOYEES																
Non-employees																
Passengers	---	---	---	---	---	---	---	---	---	---	---	---	1	1	1	
Nontrespassers	---	3	---	3	---	---	---	---	---	---	---	---	1	1	4	
Trespassers	---	---	---	---	---	---	---	---	---	---	---	---	2	2	2	
SUBTOTAL Non Employees	---	3	---	3	---	---	---	---	---	---	---	---	3	4	7	
TOTAL NON-EMPLOYEES	---	3	---	3	---	---	---	---	---	---	---	---	3	4	7	
GRAND TOTAL...																
	1	7	8	16	1	56	1	2	1	---	2	3	141	207	223	

* Persons on locomotives or cars coming in contact with structures

TABLE 132-P NATURE OF TRAIN ACCIDENT AND TRAIN INCIDENT ILLNESSES, BY CLASS OF PERSON
RAPID TRANSIT CARRIERS, 1977

	 Train Accidents				 Train Incidents										Total	Total
	Coll	Derail	Other	Total	Coup- ling	Operating..... Locos	H Brks	Switch	Fixed object*	Getting on/off	Grade xings	Struck/ run over	Misc	Total		
EMPLOYEES																
Total Groups I-V						7							1	8	8	
Groups I-V						7							1	8	8	
SUBTOTAL I-V						7							1	8	8	
VI.--- (b) Transportation (train and engine)																
Road pass conductor													1	1	1	
Rd pass engineers						1							2	3	3	
SUBTOTAL VI. (b)						1							3	4	4	
TOTAL EMPLOYEES						8							4	12	12	
GRAND TOTAL...						8							4	12	12	

* Persons on locomotives or cars coming in contact with structures

TABLE 138-A TRAIN ACCIDENTS AND DAMAGE BY MONTH
CLASS I AND CLASS II RAILROADS, 1977

Month	...RR Property Damage.. Equipment	Track And Roadbed	Collisions..... Accid- ents	Damages (\$)	Derailments.... Accid- ents	Damages (\$)	Other..... Accid- ents	Damages (\$)	Total..... Accid- ents	Damages (\$)
January	21,755,155	5,620,274	105	1,106,882	813	25,390,863	75	877,684	993	27,375,429
February	16,042,275	3,504,508	101	2,398,663	629	16,134,128	66	1,013,992	796	19,546,783
March	25,344,229	4,986,813	113	1,765,609	727	26,947,280	67	1,618,153	907	30,331,042
April	11,638,583	4,364,306	116	1,229,329	610	13,295,636	70	1,477,924	796	16,002,889
May	16,760,767	4,136,303	113	2,407,539	611	15,019,211	85	3,470,320	809	20,897,070
June	18,144,535	4,639,338	120	3,692,778	571	16,983,619	87	2,107,476	778	22,783,873
July	19,617,853	5,169,851	106	1,257,542	683	22,400,990	84	1,129,172	873	24,787,704
August	19,402,961	4,775,320	127	4,391,369	635	17,280,722	79	2,506,190	841	24,178,281
September	13,478,470	3,392,597	107	4,355,388	584	11,204,876	66	1,310,803	757	16,871,067
October	17,550,258	4,337,086	128	2,927,870	669	17,061,524	80	1,897,950	877	21,887,344
November	23,208,106	6,605,888	120	6,214,018	733	21,041,261	86	2,558,715	939	29,813,994
December	19,539,449	5,435,411	107	2,354,849	808	20,363,431	81	2,256,580	996	24,974,860
TOTAL...	222,482,641	56,967,695	1,363	34,101,836	8,073	223,123,541	926	22,224,959	10,362	279,450,336

TABLE 138-B TRAIN ACCIDENTS AND DAMAGE BY MONTH
RAPID TRANSIT CARRIERS, 1977

Month	...RR Property Damage.. Equipment	Track And Roadbed	Collisions..... Accid- ents	Damages (\$)	Derailments.... Accid- ents	Damages (\$)	Other..... Accid- ents	Damages (\$)	Total..... Accid- ents	Damages (\$)
January	92,808	23,331	4	32,500	5	41,389	5	42,250	14	116,139
February	1,160,337	19,624	1	1,147,137	4	32,824	---	---	5	1,179,961
March	39,293	5,119	1	5,829	2	13,156	2	25,427	5	44,412
April	32,025	18,353	---	---	3	47,208	1	3,170	4	50,378
May	32,060	---	1	15,300	1	5,160	1	11,600	3	32,060
June	269,200	46,000	2	255,200	2	60,000	---	---	4	315,200
July	31,635	4,429	2	17,064	---	---	2	19,000	4	36,064
August	381,632	12,825	2	146,941	1	45,016	1	202,500	4	394,457
September	628,038	21,414	2	625,553	1	11,449	1	12,450	4	649,452
October	82,000	---	---	---	---	---	3	82,000	3	82,000
November	307,605	1,564	1	38,341	2	19,346	2	251,482	5	309,169
December	49,468	8,199	4	47,667	---	---	1	10,000	5	57,667
TOTAL...	3,106,101	160,858	20	2,331,532	21	275,548	19	659,879	60	3,266,959

TABLE 139-A TRAIN ACCIDENTS, NUMBER OF UNITS,
ACCIDENTS AND DAMAGE PER MILLION UNITS
CLASS I AND II RAILROADS 1977

Month	Total Train Accidents	Number Of Units.....				Accidents Per Mill Units	Damage Per Mill Units
		Loco- Motive Miles	Motor Train Miles	Yard Switching Miles	Total Units		
January	993	38,851,000	2,657,671	17,727,015	59,235,686	16.76	462,258
February	796	38,270,525	2,768,809	17,160,063	58,199,397	13.68	335,970
March	907	43,380,882	2,772,531	19,445,625	65,599,038	13.82	462,398
April	796	42,099,971	2,676,691	18,258,840	63,035,502	12.62	253,905
May	809	43,593,502	2,700,620	18,841,093	65,135,215	12.42	320,905
June	778	42,299,293	2,744,453	18,599,327	63,643,073	12.22	358,034
July	873	41,566,309	2,725,509	17,813,202	62,105,020	14.05	399,190
August	841	42,314,431	2,837,841	18,307,553	63,459,825	13.25	381,090
September	757	41,346,768	2,617,349	17,694,320	61,658,437	12.27	273,663
October	877	43,432,605	2,645,879	18,326,915	64,405,399	13.61	339,876
November	939	41,769,929	2,620,585	18,199,541	62,590,055	15.00	476,436
December	996	40,153,802	2,651,484	18,170,358	60,975,644	16.33	409,652
GRAND TOTAL	10,362	499,079,017	32,419,422	218,543,852	750,042,291	13.81	4,473,377

TABLE 139-B TRAIN ACCIDENTS, NUMBER OF PASSENGER CAR MILES,
ACCIDENTS AND DAMAGE PER MILLION CAR MILES
RAPID TRANSIT CARRIERS, 1977

Month	Total Train Accidents	Passenger Car Miles	Accidents Per Mil Car Miles	Damage Per Mil
				Car Miles (\$)
January	14	33,894,689	0.41	3,426
February	5	27,179,334	0.18	43,416
March	5	30,126,741	0.16	1,474
April	4	27,339,931	0.14	1,842
May	3	28,177,938	0.10	1,137
June	4	28,588,022	0.13	11,025
July	4	27,608,770	0.14	1,306
August	4	29,742,201	0.13	13,261
September	4	27,540,905	0.14	23,580
October	3	28,035,417	0.10	2,924
November	5	28,529,453	0.17	10,836
December	5	29,875,114	0.16	1,930
GRAND TOTAL	60	346,638,515	0.17	9,424

TABLE 140-A NUMBER OF TRAIN ACCIDENTS AND DAMAGE
BY GENERAL CAUSES AND PRINCIPAL SUBCAUSES
CLASS I and II RAILROADS, 1977

Cause	No.	Damage (\$)	Average Damage per Accident (\$)
HUMAN FACTORS:			
Use of brakes	326	9,697,321	29,734
Employee physical condition	3	2,097,710	699,233
Flag, fixed, hand/radio signals	76	11,884,307	156,361
Other rules and instructions	714	10,556,334	14,773
Speed	221	9,140,001	41,349
Use of switches	463	5,709,145	12,318
Miscellaneous	756	16,594,573	21,941
SUBTOTAL...	2,559	65,679,391	25,655
MECHANICAL FAILURES:			
Brakes	218	6,126,678	28,096
Trailer/container on flat car	26	201,286	7,726
Body	222	7,070,207	31,840
Coupler and draft system	320	7,298,703	22,799
Truck components	379	12,262,322	32,345
Axles and journal bearings	286	14,195,479	49,628
Wheels	389	16,695,156	42,912
Doors	20	226,193	11,310
General mech failures	41	1,320,772	32,209
SUBTOTAL...	1,901	65,396,796	34,393
Locomotives	102	3,192,268	31,296
Brakes-loco	20	542,268	27,110
Body-loco	---	---	---
Coupler and draft system-loco	8	74,585	9,325
Truck components-loco	5	142,763	28,520
Axles and journal bearings-loco	8	177,858	22,225
Wheels-loco	19	1,125,402	59,221
General mech failures-loco	1	11,000	11,000
SUBTOTAL...	163	5,266,144	32,304
TRACK, ROADBED AND STRUCTURES:			
Roadbed defects	223	7,021,611	31,483
Track geometry defects	1,982	39,249,784	19,793
Nail and joint bar defects	1,219	39,833,421	32,669
Frogs, switches and appliances	878	8,506,363	9,681
Other way and structures	24	1,691,961	70,495
Signal and communication failures	11	73,864	6,700
SUBTOTAL...	4,337	96,377,004	22,214
MISCELLANEOUS:			
Collision at grade crossing	320	10,458,098	32,675
Emergency brake application	9	304,746	33,866
Vandalism	150	5,097,921	33,978
Interference by non-employees	54	1,004,345	18,587
Car overloaded/oversized-improper load	217	5,464,108	25,173
Obstruction on track	121	5,654,178	46,721
Trailer/Container improperly loaded/applied	12	488,137	40,666
Interaction of lateral/vertical forces	90	3,191,891	35,465
Failure to control speed (non-employee)	7	214,288	30,600
Snow, ice, or mud on track	40	739,958	18,495
Other acts of God	18	876,249	48,672
Miscellaneous	364	13,237,082	36,360
SUBTOTAL...	1,402	46,731,001	33,325
GRAND TOTAL:...	10,362	279,450,336	26,960

TABLE 140-B NUMBER OF TRAIN ACCIDENTS AND DAMAGE
BY CLASS OF ACCIDENT, CLASS I and CLASS II RAILROADS
1977

Class of accident	No.	Damage (\$)	Average Damage per Accident (\$)
COLLISIONS			
Head-on	110	7,440,576	67,638
Rear-end	228	9,384,025	41,145
Side	829	11,552,269	13,922
Backing	158	3,936,754	24,903
Broken train	37	1,110,952	30,016
RR Xing	1	677,260	677,300
SUBTOTAL...	1,363	34,101,836	25,007
DERAILMENTS			
Defects in brakes, hoses, etc.	169	5,486,821	32,459
Defects in couplers and draft system	288	6,883,827	23,893
Defects in locos, cars, etc	220	7,812,352	35,503
Defects in trucks, wheels, or axles	1,061	44,369,104	41,811
Defects in doors	17	214,593	12,623
Track, Roadbed and Structures	4,239	95,134,098	22,434
Obstructions on track	68	2,113,971	31,080
General Mech and Elec failures	23	1,132,425	49,230
Human factors - employees	1,351	36,415,143	26,945
Human factors - non-employees	33	805,183	24,384
Not elsewhere classifiable	604	22,756,024	37,669
SUBTOTAL...	8,073	223,123,541	27,630
OTHER TRAIN ACCIDENTS			
Rail-Hwy Xing	322	10,482,498	32,548
Obstruction	56	2,723,575	48,628
Explosion - Detonation	6	87,479	14,566
Fire or violent rupture	245	4,586,915	18,720
Other	297	4,344,492	14,620
SUBTOTAL...	926	22,224,959	23,995
GRAND TOTAL	10,362	279,450,336	26,960

TABLE 140-C NUMBER OF TRAIN ACCIDENTS AND DAMAGE
BY GENERAL CAUSES AND PRINCIPAL SUBCAUSES
RAPID TRANSIT CARRIERS, 1977

Cause	No.	Damage (\$)	Average Damage per Accident (\$)
HUMAN FACTORS:			
Use of brakes	1	6,019	6,000
Employee physical condition	---	---	---
Flag, fixed, hand/radio signals	1	1,147,137	1,147,100
Other rules and instructions	15	301,647	20,093
Speed	5	136,515	27,300
Use of switches	4	33,550	8,375
Miscellaneous	1	7,453	7,500
SUBTOTAL...	27	1,632,321	60,444
MECHANICAL FAILURES:			
Brakes	---	---	---
Trailer/container on flat car	---	---	---
Body	---	---	---
Coupler and draft system	---	---	---
Truck components	1	3,075	3,100
Axles and journal bearings	---	---	---
Wheels	3	25,895	8,600
Doors	---	---	---
General mech failures	2	17,370	8,700
SUBTOTAL...	6	46,340	7,716
Locomotives	7	297,100	42,428
Brakes-loco	---	---	---
Body-loco	---	---	---
Coupler and draft system-loco	---	---	---
Truck components-loco	---	---	---
Axles and journal bearings-loco	---	---	---
Wheels-loco	---	---	---
General mech failures-loco	1	3,227	3,200
SUBTOTAL...	8	300,327	37,525
TRACK, ROADBED AND STRUCTURES:			
Roadbed defects	---	---	---
Track geometry defects	---	---	---
Rail and joint bar defects	---	---	---
Frogs, switches and appliances	6	88,749	14,783
Other way and structures	---	---	---
Signal and communication failures	1	15,000	15,000
SUBTOTAL...	7	103,749	14,814
MISCELLANEOUS:			
Collision at grade crossing	1	2,500	2,500
Emergency brake application	---	---	---
Vandalism	---	---	---
Interference by non-employees	---	---	---
Car overloaded/oversized-improper load	---	---	---
Obstruction on track	2	17,483	8,750
Trailer/Container improperly loaded/applied	---	---	---
Interaction of lateral/vertical forces	---	---	---
Failure to control speed (non-employee)	---	---	---
Snow, ice, or mud on track	---	---	---
Other acts of God	---	---	---
Miscellaneous	9	1,164,239	129,366
SUBTOTAL...	12	1,184,222	98,691
GRAND TOTAL:...	60	3,266,959	54,441

TABLE 140-D NUMBER OF TRAIN ACCIDENTS AND DAMAGE
BY CLASS OF ACCIDENT, RAPID TRANSIT CARRIERS
1977

Class of accident	No.	Damage (\$)	Average Damage per Accident (\$)
COLLISIONS			
Head-on	4	167,343	41,825
Rear-end	10	1,374,950	137,480
Side	4	647,150	161,775
Raking	1	135,200	135,200
Broken train	1	6,889	6,900
RR Xing	---	---	---
SUBTOTAL...	20	2,331,532	116,565
DERAILMENTS			
Defects in brakes, hoses, etc.	---	---	---
Defects in couplers and draft system	---	---	---
Defects in locos, cars, etc	---	---	---
Defects in trucks, wheels, or axles	4	28,970	7,225
Defects in doors	---	---	---
Track, Roadbed and Structures	6	88,749	14,783
Obstructions on track	1	12,983	13,000
General Mech and Elec failures	1	14,200	14,200
Human factors - employees	5	50,170	10,020
Human factors - non-employees	---	---	---
Not elsewhere classifiable	4	80,476	20,125
SUBTOTAL...	21	275,548	13,114
OTHER TRAIN ACCIDENTS			
Rail-Hwy Xing	1	2,500	2,500
Obstruction	3	13,500	4,500
Explosion - Detonation	---	---	---
Fire or violent rupture	9	545,733	60,633
Other	6	98,146	16,350
SUBTOTAL...	19	659,879	34,726
GRAND TOTAL	60	3,266,959	54,441

TABLE 143-A NATURE OF INJURIES
BY TRAIN ACCIDENTS, TRAIN INCIDENTS AND NOSTRAIN INCIDENTS
CLASS I AND II RAILROADS 1977

Class of Accident	Amputations						Fractures						Other Injuries														Total Injuries	Total Fatalities
	Arm or Hand	Finger	Leg or Foot	Toe	Other Part	Total	Arm or Hand	Finger	Leg or Foot	Toe	Head or Face Bones	Torso	Other	Total	Bruise	Sprain or Strain	Cut or Laceration	Electric Shock or Burn	Other Burns	Dislocation	Cinder, etc in Eye	Other	Total					
TRAIN ACCIDENTS																												
Collisions.....	---	---	2	---	---	2	2	2	6	1	1	9	2	23	86	73	21	---	1	1	3	21	206	231	4			
Deraillments.....	1	---	1	---	1	3	2	2	4	2	2	9	---	21	144	142	38	---	5	4	1	34	358	392	8			
Other Train Accidents.....	---	---	2	---	---	3	---	---	11	---	9	9	4	42	105	60	74	1	17	1	4	39	301	366	96			
Total.....	2	---	5	---	1	8	13	4	21	3	12	27	6	66	335	275	133	1	23	6	8	94	875	969	108			
TRAIN INCIDENTS																												
Coupling or uncoupling.....	1	7	7	2	---	17	14	15	16	5	2	9	1	62	220	304	103	---	4	3	25	17	676	755	9			
Operating locomotives.....	---	---	---	---	---	5	5	5	---	---	---	6	4	25	171	186	70	2	10	6	369	23	837	862	---			
Operating rail motor car.....	---	---	---	1	---	1	8	3	14	1	2	8	3	39	140	87	56	---	2	2	11	13	311	351	---			
Operating hand brakes.....	2	---	3	1	---	6	9	3	3	2	---	3	2	22	105	129	34	---	---	5	1	8	282	310	3			
Operating switches.....	1	---	1	---	---	2	1	---	1	---	1	1	---	4	27	43	6	---	3	1	17	3	100	106	---			
Coming in contact w/fixd obj.....	---	---	2	---	---	2	7	1	7	---	1	8	1	25	144	48	57	---	---	1	3	2	255	282	6			
Getting on/off loco or cars.....	5	1	38	9	---	53	34	23	77	12	4	22	8	180	623	1,318	215	---	2	26	4	36	2,224	2,457	30			
Accidents at Highway.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---			
Grades.....	5	1	13	1	2	22	126	9	196	1	114	197	42	685	1,253	365	1,300	---	3	17	3	630	3,571	4,278	851			
Other struck or run over.....	16	5	75	6	1	103	24	1	46	1	18	23	11	124	133	48	157	1	---	---	---	---	---	---	408			
Flying or falling objects.....	---	---	---	---	---	---	---	---	5	1	2	2	2	12	66	16	61	3	100	1	1,217	33	1,497	1,509	---			
Assaults.....	---	---	---	---	---	---	5	---	---	1	5	1	---	12	54	7	100	---	---	1	51	21	234	246	---			
Miscellaneous.....	2	15	11	6	1	35	45	60	70	13	22	82	17	309	1,101	839	468	---	14	15	17	95	2,549	2,893	33			
Total.....	32	29	150	26	4	241	278	120	440	37	171	362	91	1,499	4,037	3,390	2,627	6	138	79	1,721	931	12,929	14,669	1,340			
NOSTRAIN INCIDENTS																												
Coupling incidents.....	---	2	1	---	---	3	25	33	30	21	8	13	3	133	488	922	267	---	19	7	44	48	1,789	1,925	---			
Operating switches.....	1	3	---	---	---	4	15	32	15	38	5	13	1	119	342	1,436	92	---	2	12	28	67	1,981	2,104	---			
Getting on/off locos or cars.....	---	3	---	1	---	4	38	17	97	5	7	35	3	202	654	1,468	247	---	1	22	4	36	2,432	2,638	2			
Servicing or maintenance of equip.....	2	56	1	2	---	61	148	492	172	185	55	57	32	1,141	2,646	3,779	2,736	126	821	60	1,637	440	12,245	13,447	3			
Maintenance of way and structures.....	5	69	6	3	1	84	177	712	359	319	63	95	39	1,764	3,867	5,823	3,696	77	406	96	1,160	483	15,610	17,458	14			
Involving freight, baggage, etc.....	---	3	---	---	---	3	---	7	4	3	---	---	---	14	51	129	62	---	2	1	7	5	257	274	---			
Involving windows, doors, etc.....	1	9	1	1	---	12	18	84	17	8	6	8	6	147	328	288	343	---	3	2	12	28	1,004	1,163	3			
Involving passenger car doors.....	---	1	---	---	---	1	---	2	1	---	---	---	---	3	14	3	8	---	---	---	---	2	27	31	---			
Stumbling, falling not on car/loco.....	---	3	---	---	---	3	117	53	197	20	19	76	15	497	1,177	2,383	546	2	4	43	12	87	4,254	4,754	9			
Flying/falling obj, burn, etc.....	---	---	---	---	---	---	5	16	19	35	5	4	2	86	164	34	163	41	151	2	1,135	58	1,748	1,834	9			
Assaults to persons.....	---	---	---	---	---	---	4	4	---	1	5	2	2	18	98	33	97	---	---	1	9	22	260	278	2			
Miscellaneous.....	---	10	5	---	---	15	48	100	57	24	29	59	4	321	911	1,639	787	8	37	34	149	603	4,162	4,498	36			
TOTAL.....	9	159	14	7	1	190	595	1,552	968	659	202	362	107	4,445	10,740	17,939	9,032	254	1,446	282	4,197	1,879	45,769	50,404	78			
GRAND TOTAL.....	43	188	169	33	6	439	886	1,676	1,429	699	385	751	204	6,030	15,112	21,604	11,792	261	1,607	367	5,926	2,904	59,573	66,042	1,526			

TABLE 143-B NATURE OF INJURIES
BY CLASS OF PERSON, CLASS I AND CLASS II RAILROADS, 1977

Class of Person	Amputations						Fractures						Other Injuries										Total Injuries	Total Injury Fatalities		
	Arm or Hand	Finger	Leg or Foot	Toe	Other Part	Total	Arm or Hand	Finger	Leg or Foot	Toe	Head or Face	Torso	Other	Total	Bruise	Sprain or Strain	Cut or Laceration	Electric Shock or Burns	Other Burns	Dislocation	Cinder etc in eye	Other				
EMPLOYEES ON DUTY																										
YARD SERVICE:																										
Engineers and Motormen.....	---	1	---	---	---	1	8	12	9	---	2	6	1	38	179	267	97	1	7	9	216	25	801	840	1	
Firemen and Helpers.....	---	---	---	---	---	---	5	2	1	1	---	---	---	9	48	65	24	---	3	---	51	7	198	207	---	
Conductors and Foremen.....	1	1	4	3	1	10	25	19	29	7	7	18	7	112	438	824	172	1	16	8	179	65	1,701	1,823	11	
Brakemen and Helpers....	4	8	11	4	---	27	77	95	110	61	11	58	6	418	1,653	3,205	697	2	94	43	877	184	6,755	7,200	17	
FREIGHT SERVICE:																										
Engineers and Motormen.....	1	---	2	---	---	3	10	19	12	4	4	10	4	63	232	383	139	4	15	6	259	48	1,086	1,152	4	
Firemen and Helpers.....	---	---	---	---	---	---	1	5	2	1	---	---	---	1	10	52	91	40	---	4	1	63	14	265	275	---
Conductors.....	2	5	3	1	1	12	26	36	33	6	7	50	11	169	489	677	240	---	13	12	196	71	1,698	1,879	10	
Brakemen and Flagmen....	4	6	11	---	---	21	63	64	95	32	21	68	14	357	1,287	2,217	606	---	50	37	674	170	5,041	5,419	23	
PASSENGER SERVICE:																										
Engineers and Motormen.....	---	---	---	---	---	---	2	1	---	---	1	2	---	6	25	40	16	1	---	---	22	5	109	115	1	
Firemen and Helpers.....	---	---	---	---	---	---	1	3	1	---	---	1	---	6	14	17	7	1	2	---	10	2	53	59	---	
Conductors.....	---	2	1	---	---	3	1	1	2	2	---	---	---	8	43	42	22	1	1	1	16	5	131	142	---	
Baggage men.....	---	---	---	---	---	---	---	2	---	---	---	---	---	2	4	6	3	---	---	---	---	---	---	---	---	
Brakemen and Flagmen.....	---	---	---	---	---	---	---	5	2	---	1	1	1	10	63	69	17	1	---	1	20	5	176	186	1	
HOSTLERS.....	---	---	---	1	---	1	4	6	7	2	1	2	---	22	73	147	43	---	9	2	40	10	324	347	1	
OTHER EMPLOYEES.....	5	159	11	10	1	186	453	1,370	756	568	172	269	100	3,688	8,661	12,719	7,779	225	1,350	219	3,251	1,487	35,691	39,565	42	
SUMMARY																										
Total employees on duty...	17	162	43	19	3	264	676	1,640	1,059	684	227	487	145	4,918	13,257	20,769	9,902	237	1,566	339	5,874	2,098	54,042	59,224	111	
Employees not on duty...	---	---	2	---	---	2	17	7	41	1	4	5	1	76	131	226	88	1	13	4	33	31	527	605	2	
Passengers.....	---	---	1	1	---	2	8	7	16	5	3	---	---	47	157	107	110	---	5	2	6	23	450	499	4	
Nonresponders.....	5	1	16	2	1	25	154	20	259	8	134	219	50	844	1,439	474	1,493	5	20	30	694	4,158	5,027	951		
Trespassers.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
GRAND TOTAL.....	43	188	169	33	6	439	896	1,676	1,429	699	385	751	204	6,030	15,112	21,694	11,792	261	1,607	367	5,926	2,994	59,573	66,042	1,526	

TABLE 143-C NATURE OF INJURIES
BY TRAIN ACCIDENTS, TRAIN INCIDENTS AND NONTRAIN INCIDENTS
RAPID TRANSIT CARRIERS, 1977

Class of Accident	Amputations					Fractures								Other Injuries										Total Injury Fatalities
	Arm or Hand	Finger	Leg or Foot	Toe	Other Part	Total	Arm or Hand	Finger	Leg or Foot	Toe	Head or Face Bones	Torso	Other	Total	Bruise	Sprain or Strain	Cut or Laceration	Electric Shock or Burn	Other Burns	Dislocation	Cinder, etc. in eye	Other	Total Injuries	
TRAIN ACCIDENTS																								
Collisions.....	---	---	---	---	---	5	---	2	---	4	11	9	31	93	71	21	---	---	---	---	11	196	227	12
Derailments.....	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	---	---	---	---	1	---	
Other Train Accidents.....	---	---	---	---	---	---	---	---	---	---	---	---	---	2	---	---	---	---	---	---	---	2	---	
Total.....	---	---	---	---	---	5	---	2	---	4	11	9	31	96	71	21	---	---	---	---	11	199	230	12
TRAIN INCIDENTS																								
Coupling or uncoupling.....	---	---	---	---	---	---	---	---	---	---	---	1	1	---	---	---	---	---	---	---	---	1	---	
Operating locomotives.....	---	---	---	---	---	---	---	---	---	---	---	---	---	6	3	2	---	---	---	---	5	17	---	
Operating rail motor car.....	---	---	---	---	---	---	1	1	---	---	---	---	2	10	4	3	---	---	---	---	1	18	---	
Operating hand brakes.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	20	---	
Operating switches.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	2	---	---	---	---	---	---	2	---	
Coming in contact w/fxd obj.....	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---	1	---	---	---	---	---	2	---	
Getting on/off loco or cars.....	---	---	---	---	---	---	---	---	---	---	1	---	1	95	9	13	---	---	---	2	---	1	---	
Accidents at Highway Grades.....	---	---	---	---	---	---	---	---	---	---	---	---	---	1	1	---	---	---	---	---	---	2	---	
Other struck or run over.....	2	---	1	---	---	3	1	---	2	---	---	---	3	36	4	20	---	---	---	---	---	60	---	
Flying or falling objects.....	---	---	---	---	---	---	---	---	---	---	---	---	---	8	1	7	4	---	---	---	35	61	---	
Assaults.....	---	---	---	---	---	---	---	---	---	---	---	---	---	3	47	31	7	---	---	---	18	107	---	
Miscellaneous.....	---	---	---	---	---	4	4	6	1	2	2	2	21	255	94	66	2	2	2	1	7	12	---	
Total.....	2	---	1	---	---	3	5	5	9	1	2	3	29	459	121	143	6	2	3	67	27	828	---	
NONTRAIN INCIDENTS																								
Coupling incidents.....	---	---	---	---	---	---	---	---	---	---	---	---	---	5	3	3	---	---	---	---	---	11	---	
Operating switches.....	---	---	---	---	---	---	---	---	---	---	1	---	1	3	7	1	---	---	---	---	---	11	---	
Getting on/off locos or cars.....	---	---	---	---	---	1	1	5	---	---	---	---	7	101	77	26	---	---	---	1	---	1	---	
Servicing or maintenance of equip.....	---	---	---	---	---	5	13	8	6	---	4	1	37	218	305	146	31	17	1	68	66	852	---	
Maintenance of way and structures.....	---	2	---	---	---	2	10	31	4	13	---	2	60	308	406	159	23	14	1	60	77	1,048	---	
Involving freight, baggage, etc.....	---	---	---	---	---	---	---	---	---	---	---	---	---	1	3	10	---	---	---	2	---	16	---	
Involving windows, doors, etc.....	---	---	---	---	---	1	4	---	1	---	---	---	6	51	35	27	1	---	---	1	2	117	---	
Involving passenger car doors.....	---	---	---	---	---	1	1	1	---	---	---	---	3	101	18	23	---	---	---	---	6	148	---	
Stumbling, falling not on car/loco.....	---	1	---	---	---	1	34	5	49	3	5	10	106	1,417	728	548	3	4	13	2	39	2,754	---	
Flying/falling obj's, burns, etc.....	---	---	---	---	---	---	2	---	2	---	---	---	4	57	4	19	10	6	---	42	44	162	---	
Assaults to persons.....	---	---	---	---	---	4	4	---	---	4	---	---	8	223	44	105	---	1	---	18	64	455	---	
Miscellaneous.....	---	---	---	---	---	7	7	3	2	3	2	---	24	170	165	78	9	1	2	4	48	477	---	
Total.....	---	3	---	---	---	3	59	68	70	27	12	19	256	2,655	1,795	1,145	77	43	18	197	347	6,536	---	
GRAND TOTAL.....	2	3	1	---	---	6	69	73	81	28	18	14	316	3,210	1,987	1,309	83	45	21	264	385	7,304	---	

TABLE 143-D NATURE OF INJURIES
BY CLASS OF PERSON, RAPID TRANSIT CARRIERS, 1977

Class of Person	Amputations					Fractures					Other Injuries					Total Injuries	Total Injury Fatalities					
	Arm or Hand	Finger	Leg or Foot	Toe	Other Part	Arm or Hand	Finger	Leg or Foot	Toe	Head or Face	Torso	Other	Total	Bruise	Sprain or Strain			Cut or Laceration	Electric Shock or Burn	Other Burns	Dislocation	Cinder etc in eye
EMPLOYEES ON DUTY																						
RAIL SERVICE:																						
Engineers and Motormen	---	---	---	---	---	1	---	2	---	---	---	---	3	6	12	2	2	---	---	1	23	26
Firemen and Helpers	---	---	---	---	---	---	---	---	---	---	---	---	---	2	2	---	1	---	---	1	6	6
Conductors and Foremen	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	1	1	---	---	---	3	3
Brakemen and Helpers	---	---	---	---	---	---	---	---	---	---	---	1	1	17	10	6	---	1	---	1	35	36
FREIGHT SERVICE:																						
Engineers and Motormen	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	---	---	1	1
Firemen and Helpers	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
Conductors	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
Brakemen and Flagmen	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
PASSENGER SERVICE:																						
Engineers and Motormen	---	---	---	---	---	4	4	7	1	1	---	1	18	98	88	45	8	---	---	35	21	
Firemen and Helpers	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
Conductors	---	---	---	---	---	2	4	3	---	1	1	1	12	158	99	51	7	---	---	32	23	
Baggage men	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
Brakemen and Flagmen	---	---	---	---	---	---	---	---	---	---	---	---	---	---	2	1	1	---	---	---	4	
HOSTLERS	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	1	
OTHER EMPLOYEES	---	2	---	---	---	2	30	61	29	25	3	13	1	162	956	1,248	455	56	39	10	179	
SUMMARY																						
Total employees on duty	---	2	---	---	---	2	37	69	41	26	5	14	4	196	1,238	1,463	560	76	40	10	247	
Employees not on duty	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	3	
Passengers	---	---	---	---	---	10	2	9	1	5	13	10	50	681	161	209	3	2	3	14	40	
Nontravellers	---	---	---	---	---	1	19	2	27	1	7	4	60	1,171	342	462	2	1	7	2	38	
Trespassers	2	---	1	---	---	3	3	---	4	---	1	2	10	120	21	76	2	2	---	5	227	
GRAND TOTAL	2	3	1	---	---	6	69	73	81	28	18	14	316	3,210	1,987	1,309	83	45	21	264	385	

TABLE 144-A CASUALTIES TO EMPLOYEES ON DUTY
CLASS I AND CLASS II RAILROADS, 1977

Nature of injury	Number of injuries	Number of lost workdays	Average days per injury
INJURIES			
Bruise - Contusion.....	13,257	77,348	5.83
Sprain - Strain.....	20,769	188,751	9.08
Cut or laceration - abrasion.....	9,902	31,718	3.20
Electrical burn or shock.....	237	2,003	8.45
Other burns.....	1,566	7,185	4.58
Dislocation.....	339	5,705	16.82
Fracture--arm or hand.....	676	17,033	25.19
fingers.....	1,640	12,690	7.73
leg or foot.....	1,059	38,351	36.21
toes.....	684	6,663	9.74
head or face.....	227	3,874	17.06
torso.....	487	12,445	25.55
other parts.....	145	2,646	18.24
Amputation--arm or hand.....	17	2,500	147.05
fingers.....	182	4,903	26.93
leg or foot.....	43	8,056	187.34
toes.....	19	1,249	65.73
other parts.....	3	272	90.66
Cinder or other foreign particle in eye.....	5,874	7,652	1.30
Hernia.....	390	14,676	37.63
Concussion.....	160	2,833	17.70
Nervous shock.....	42	306	7.28
Internal injuries.....	56	1,573	28.08
Loss of eye.....	3	470	156.66
Not otherwise classified.....	1,447	6,938	4.79
TOTAL.....	59,224	457,840	7.73
Occupational skin diseases or disorders.....	895	1,759	1.96
Dust diseases of the lungs.....	16	132	8.25
Respiratory conditions due to toxic agents.....	308	1,637	5.31
Poisoning.....	48	202	4.20
Disorders due to physical agents.....	295	876	2.96
Disorders due to repeated trauma.....	76	395	5.19
All other occupational illnesses.....	166	625	3.76
TOTAL.....	1,804	5,626	3.11
Nonfatal Injuries.....	59,224	457,840	7.73
Nonfatal Illnesses.....	1,804	5,626	3.11
Fatalities.....	114	---	0.00
TOTAL.....	61,142	458,466	7.63

TABLE 144-B CASUALTIES TO RAPID TRANSIT EMPLOYEES ON DUTY
1977

Nature of injury	Number of injuries	Number of lost workdays	Average days per injury
INJURIES			
Bruise - Contusion.....	1,238	4,431	3.57
Sprain - Strain.....	1,463	6,927	4.73
Cut or laceration - abrasion.....	560	1,654	2.95
Electrical burn or shock.....	76	468	6.15
Other burns.....	40	141	3.52
Dislocation.....	10	97	9.70
Fracture--arm or hand.....	37	645	17.43
fingers.....	69	652	9.44
leg or foot.....	41	904	22.04
toes.....	26	246	9.46
head or face.....	5	75	15.00
torso.....	14	177	12.64
other parts.....	4	102	25.50
Amputation--arm or hand.....	---	---	0.00
fingers.....	2	29	14.50
leg or foot.....	---	---	0.00
toes.....	---	---	0.00
other parts.....	---	---	0.00
Cinder or other foreign particle in eye.....	247	1,210	4.89
Hernia.....	33	50	1.51
Concussion.....	6	78	13.00
Nervous shock.....	31	192	6.19
Internal injuries.....	3	7	2.33
Loss of eye.....	---	---	0.00
Not otherwise classified.....	229	641	2.79
TOTAL.....	4,134	18,726	4.52
Occupational skin diseases or disorders.....	38	47	1.23
Dust diseases of the lungs.....	1	---	0.00
Respiratory conditions due to toxic agents.....	13	23	1.76
Poisoning.....	---	---	0.00
Disorders due to physical agents.....	1	---	0.00
Disorders due to repeated trauma.....	1	3	3.00
All other occupational illnesses.....	1	---	0.00
TOTAL.....	55	73	1.32
Nonfatal Injuries.....	4,134	18,726	4.52
Nonfatal Illnesses.....	55	73	1.32
Fatalities.....	4	---	0.00
TOTAL.....	4,193	18,799	4.48

TABLE 151-A CASUALTIES IN NONTRAIN INCIDENTS BY OCCURRENCE, 1977

Occurrence no	Occurrence	Class I Line-haul		Class I Switching + Terminal		Class II		Totals for All Carriers		Rapid Transit		Total Nonfatal Illnesses
		Kld	Inj	Kld	Inj	Kld	Inj	Kld	Inj	Kld	Inj	
A. COUPLING AND UNCOUPLING LOCOMOTIVES OR CARS												
002	Adjusting coupler - equipment standing.....	---	455	---	22	---	31	---	509	---	1	---
004	Adjusting coupler, part of coupler fell striking person-eqp standing.....	---	108	---	5	---	7	---	120	---	---	---
005	Use of uncoupling lever - equipment standing.....	---	149	---	7	---	27	---	185	---	2	---
007	Striking parts of body against equipment - equipment standing.....	---	87	---	4	---	6	---	99	---	2	---
008	Stumbled,slipped,fell,stepped on foreign obj/irreg surface-eqp std.....	---	171	---	12	---	22	---	208	---	3	1
009	Other acc/inc while coupling/uncoupling cars or locos - equip std.....	---	188	---	12	---	13	---	216	---	3	1
SUBTOTAL.....		---	1,158	---	62	---	106	---	1,337	---	11	2
B. COUPLING OR UNCOUPLING AIR OR STEAM HOSE												
052	Uncoupl air hose,struck by hose due to sudden release of air-eqp std.....	---	94	---	1	---	12	---	107	---	---	---
053	Coupling air hose,stk by hose due to sudden release of air - eqp std.....	---	42	---	5	---	8	---	55	---	---	---
054	Stumbled,slipped,fell, or stepped on foreign obj, etc., eqp standing.....	---	85	---	8	---	11	---	104	---	---	1
055	Defective equipment - equipment standing.....	---	7	---	---	---	---	---	7	---	---	---
056	Burned by hot water or steam from hose - equipment standing.....	---	9	---	---	---	4	---	13	---	---	---
057	Opening or closing angle cocks - equipment standing....	---	81	---	3	---	8	---	92	---	---	2
059	Oth A/I while coupl/uncoupl air/steam hose or turn angl cock-eqp std.....	---	200	---	5	---	16	---	221	---	---	5
SUBTOTAL.....		---	518	---	22	---	59	---	599	---	---	8
C. OPERATING LOCOMOTIVES												
101	Burn or electrical shock - equipment standing.....	---	8	---	---	---	1	---	15	---	6	---
102	Striking parts of body against equipment, moving about loco-eqp std.....	---	54	---	5	---	6	---	67	---	2	1
103	Struck by tools or other objects falling - equipment standing.....	---	13	---	---	---	6	---	20	---	1	---
104	Stumbled, slipped, fell, stepped on foreign obj, etc., - eqp std.....	---	74	---	2	---	11	---	90	---	3	---
105	Checking, oiling, servicing locomotive, etc. - equipment standing.....	---	60	---	2	---	5	---	67	---	---	---
109	Inhalation of or contact with fumes or gases - equipment standing.....	---	3	---	---	---	5	---	8	---	---	24
110	Defective locomotive seat - equipment standing.....	---	26	---	1	---	---	---	30	---	3	2
111	Adjusting locomotive seat - equipment standing.....	---	23	---	---	---	1	---	27	---	3	---
112	Foreign object in eye - equipment standing.....	---	68	---	4	---	8	---	83	---	3	3
119	Other accidents/incidents while operating locomotives - eqp standing.....	---	73	---	7	---	11	---	94	---	3	6
SUBTOTAL.....		---	402	---	21	---	54	---	501	---	24	36
D. OPERATING RAIL MOTORCARS												
151	Striking parts of body against equipment - equipment standing.....	---	8	---	1	---	2	---	16	---	5	---
152	Struck by tools or other objects falling - equipment standing.....	---	1	---	2	---	2	---	5	---	---	---
153	Stumbled, slipped, fell or stepped on foreign obj, etc., - eqp std.....	---	13	---	---	---	1	---	16	---	2	---
155	Placing or removing rail motorcar on or off rail.....	---	55	---	---	---	8	---	63	---	---	---
159	Other accidents/incidents while operating rail motorcars - eqp std.....	---	15	---	---	---	2	---	17	---	---	---
SUBTOTAL.....		---	92	---	3	---	15	---	117	---	7	---
E. OPERATING HAND BRAKES												
201	Defective equipment - equipment standing.....	---	57	---	4	---	2	---	63	---	---	---
202	Pawl slipping or accidentally knocked out of ratchet - eqp standing.....	---	18	---	---	---	3	---	21	---	---	---
203	Striking body not due to movement of equipment.....	---	51	---	---	---	2	---	54	---	1	---
205	Caught between parts of equipment or lading - equipment standing.....	---	9	---	1	---	1	---	11	---	---	---
206	Brake chains or bolts, breaking or giving way - equipment standing.....	---	20	---	1	---	3	---	25	---	1	---
207	Losing hold, slipping, or falling - equipment standing....	---	127	---	4	---	6	---	137	---	---	---
208	Caught hand or fingers in spinning brake wheel - equipment standing.....	---	40	---	---	---	8	---	49	---	1	---
209	Other accidents/incidents while operating hand brakes - eqp standing.....	---	398	---	11	---	21	---	432	---	2	---
SUBTOTAL.....		---	720	---	21	---	46	---	792	---	5	---
F. OPERATING SWITCHES												
301	Slipped, tripped or fell due to ice or snow.....	---	100	---	9	---	6	---	117	---	2	---
302	Slipped, tripped or fell not due to ice or snow.....	---	126	---	8	---	13	---	149	---	2	1
303	Parts of body struck or caught by mechanism of switch..	---	215	---	8	---	10	---	235	---	2	1
305	Lining switches, defective equipment.....	---	248	---	12	---	13	---	274	---	1	---
306	Lining switches, no defects.....	---	643	---	54	---	46	---	743	---	---	---
309	Other accidents/incidents while operating switches - equipment std.....	---	542	---	16	---	35	---	598	---	5	12

(CONT.)

TABLE 151-A CASUALTIES IN NONTRAIN INCIDENTS BY OCCURRENCE, 1977

Occurrence no	Occurrence	Class I Line-haul		Class I Switching + Terminal		Class II		Totals for All Carriers		Rapid Transit		Total Nonfatal Illnesses
		Kld	Inj	Kld	Inj	Kld	Inj	Kld	Inj	Kld	Inj	
F. OPERATING SWITCHES (CONT.)												
SUBTOTAL.....		---	1,874	---	107	---	123	---	2,116	---	12	14
G. PERSONS ON LOCOS OR CARS COMING IN CONTACT WITH FIXED OBJES												
401	Persons on top locos/cars contacting fixed objects - equipment std.....	---	10	---	---	---	4	---	14	---	---	---
402	Persons on side/end of locos/cars contacting fixed objects - eqp std.....	---	13	---	1	---	2	---	16	---	---	---
409	Persons on loco/car coming in contact with fixed obj(othr)-eqp std.....	1	22	---	1	---	2	1	26	---	1	---
SUBTOTAL.....		1	45	---	2	---	8	1	56	---	1	---
H. GETTING ON OR OFF CARS OR LOCOMOTIVES												
501	Slip/fell due to lost/missed hold of grabiron,handhold,etc.-eqp std.....	---	123	---	7	---	12	---	154	---	12	---
502	Slip/fell due to losing/missing footing on step,stirrup,etc.-eqp std.....	---	500	---	15	---	38	---	577	---	24	1
503	Stepping or tripping on parts of track in place - equipment standing.....	---	87	---	5	---	12	---	107	---	3	---
504	Stepping or tripping on foreign material or irreg surface - eqp std.....	---	724	---	35	---	37	---	804	---	8	---
505	Slipping on ice or snow on ground - equipment standing.....	---	86	---	2	---	10	---	101	---	3	---
506	Slipping on ice/snow on cars or locomotives - equipment standing.....	---	87	---	---	---	5	---	95	---	3	---
507	Falling, slipping, tripping, not elsewhere classified - eqp std.....	---	180	---	11	---	15	---	231	---	25	---
508	Slipping/falling while boarding/alighting fm passenger eqp(standing).....	---	116	---	---	---	1	---	228	---	111	---
511	Strike/struck by eqp/structures(not bridge/trestle), or mat -eqp std.....	2	107	---	3	---	5	2	116	---	1	---
512	Striking or being struck by bridges or trestles - equipment standing.....	---	1	---	---	---	2	---	4	---	1	---
513	Jumping from equipment - equipment standing.....	---	29	---	3	---	3	---	38	---	3	---
514	Defective equipment - equipment standing.....	---	39	---	1	---	8	---	54	---	6	---
519	Other acc/inc while getting on or off cars or locos - equipment std.....	---	299	---	13	---	17	---	342	---	13	---
SUBTOTAL.....		2	2,378	---	95	---	165	2	2,851	---	213	1
I. RAIL EQUIPMENT AND RAIL-HIGHWAY GRADE CROSSING ACCIDENT/INCIDENT												
609	Casualty at public rail-hwy X-ing (not rptd on form 6180-54)-eqp std.....	10	127	---	2	---	---	10	129	---	---	---
SUBTOTAL.....		10	127	---	2	---	---	10	129	---	---	---
J. STRUCK BY/RAN INTO LOCOS OR CARS NOT AT HWY GRADE CROSSING												
701	Standing, walking or running on or along track - equipment standing.....	2	3	---	---	---	2	2	5	---	---	---
702	Crossing track at private rail-highway crossing - equipment standing.....	---	1	---	1	---	---	---	2	---	---	---
703	Crossing track not at a crossing - equipment standing..	---	3	---	---	---	---	---	3	---	---	---
708	Passing over, through, or under cars - equipment standing.....	1	9	---	---	---	---	1	9	---	---	---
709	Struck by or ran into locos/cars (not at public X-ing),misc-eqp std.....	---	8	---	4	---	---	---	12	---	---	---
SUBTOTAL.....		3	24	---	5	---	2	3	31	---	---	---
K. SERVICING OR MAINTENANCE OF EQUIPMENT												
802	Crossing over, under, or between locos or cars - equipment standing.....	---	110	---	5	---	4	---	121	---	2	---
803	Striking or being struck by eqp, structures, or material-eqp std.....	1	912	---	22	---	39	1	1,061	---	88	---
804	Use of hand tools.....	---	1,694	---	33	---	71	---	1,837	---	39	10
805	Use of portable power tools.....	---	332	---	5	---	11	---	356	---	8	2
806	Use of welding equipment.....	---	396	---	9	---	9	---	418	---	4	20
807	Use of oxygen-acetylene, natural gas cutting equipment..	---	269	---	10	---	16	---	297	---	2	---
808	Use of grinding equipment.....	---	121	---	5	---	6	---	137	---	5	---
809	Use of scaffolds, ladders, etc.....	---	137	---	3	---	3	---	190	---	47	---
810	Use of cranes, hoists, derricks, piledrivers, etc.....	---	292	---	6	---	2	---	303	---	3	---
811	Use of lift trucks and other portable material handling eqp.....	---	187	---	2	---	15	---	206	---	2	1
812	Use of shop machinery not elsewhere classified.....	---	224	---	3	---	13	---	250	---	10	---
813	Loading and unloading materials.....	---	370	---	11	---	18	---	438	---	39	1
814	Handling material by hand.....	---	1,679	---	30	---	46	---	2,014	---	259	13
816	Inhalation of or contact with fumes or gases.....	---	12	---	1	---	---	---	20	---	7	70
817	Foreign object in eye, using eye protection.....	---	372	---	19	---	7	---	413	---	15	1
818	Foreign object in eye, not using eye protection.....	---	619	---	15	---	36	---	707	---	37	1
819	Struck by flying of falling object.....	---	716	---	11	---	15	---	799	---	57	2
820	Electrical flash, shock, or burn.....	---	143	---	7	---	14	---	211	---	47	32
821	Fire or explosion of fuses of torpedoes.....	---	9	---	---	---	---	---	9	---	---	2
822	Other fire or explosion.....	---	55	---	1	---	3	---	59	---	---	2
823	Burned or irritated by hot, corrosive, or toxic substances.....	---	266	---	2	---	12	---	301	---	21	101
824	Stumbling, slipping, falling, caught, not elsewhere classified.....	1	1,576	---	52	---	41	1	1,820	---	151	2

(CONT.)

TABLE 151-A CASUALTIES IN NONTRAIN INCIDENTS BY OCCURRENCE, 1977

Occurrence no	Occurrence	Class I Line-haul		Class I Switching + Terminal		Class II		Totals for All Carriers		Rapid Transit		Total Nonfatal Injuries
		Kld	Inj	Kld	Inj	Kld	Inj	Kld	Inj	Kld	Inj	
M. MISCELLANEOUS (CONT.)												
926	standing.....	---	6	---	---	---	---	---	68	---	62	---
	Striking side door while entering coach-equipment	---	4	---	---	---	---	---	5	---	1	---
927	standing.....	---	---	---	---	---	---	---	---	---	---	---
	Striking side door while exiting coach-equipment	---	---	---	---	1	---	---	2	---	1	---
	standing.....	---	---	---	---	---	---	---	2	---	---	---
	SUBTOTAL.....	---	25	---	---	6	---	---	182	---	151	---
4. STUMBLING, SLIPPING, FALLING, CAUGHT, NOC												
930	Stumbling/slipping, etc. on snow or ice.....	---	714	---	24	---	36	---	779	---	5	---
931	Stumbling/slipping, etc. on foreign material or	---	---	---	---	---	---	---	---	---	---	---
	irregular surface.....	---	1,632	---	59	---	59	---	1,908	---	158	5
932	Stumbling/slipping, etc. on parts of track in place....	---	332	---	6	---	17	---	373	---	18	1
933	Stumbling/slipping, etc. on stairways, ramps or	---	---	---	---	---	---	---	---	---	---	---
	platforms.....	4	635	---	26	---	31	6	2,676	2	1,984	---
934	Slip/fall, etc. between loco/car and other cars and	---	---	---	---	---	---	---	---	---	---	---
	struct-eqp std.....	---	85	---	2	---	4	---	179	---	88	---
935	From bridges or trestles.....	1	42	---	2	---	1	1	46	---	1	2
936	From structures other than bridges or trestles.....	2	54	---	2	---	4	2	166	---	106	---
937	Into depressions.....	---	201	---	8	---	8	2	457	2	240	---
938	While on locomotive or car-equipment standing.....	---	246	---	1	---	8	---	281	---	26	---
939	Other, stumbling, slipping, falling, caught, etc.....	2	489	---	12	---	14	2	750	---	235	4
	SUBTOTAL.....	9	4,430	---	142	---	182	13	7,615	4	2,861	12
5. FLYING OR FALLING OBJECTS, BURNS AND SIMILAR CAUSES, NOC												
940	Foreign object in eye.....	---	1,008	---	58	---	62	---	1,145	---	17	2
941	Struck by flying of falling object (except assaults)...	2	387	---	6	---	15	2	519	---	111	---
942	Electrical flash, shock, or burn.....	5	44	---	1	---	3	6	69	1	21	2
943	Fire or explosion of fuses or torpedoes.....	---	30	---	---	---	1	---	31	---	---	1
944	Other fire or explosion.....	1	35	---	---	---	3	1	43	---	5	3
945	Burned by hot or corrosive substances.....	---	66	---	6	---	6	---	88	---	10	12
946	Inhalation of or contact with fumes or gases.....	1	14	---	---	---	2	1	31	---	15	104
949	Other acc/inc resulting from flying/falling objs,	---	---	---	---	---	---	---	---	---	---	---
	burns, etc.....	---	83	---	1	---	3	---	94	---	7	14
	SUBTOTAL.....	9	1,667	---	72	---	95	10	2,020	1	186	138
6. OPERATION OF ON-TRACK WORK EQUIPMENT												
954	Getting on/off on-track work equipment - equipment	---	---	---	---	---	---	---	---	---	---	---
	standing.....	---	84	---	5	---	3	---	100	---	8	---
959	Other A/I involving on-track work equipment - equipment	---	---	---	---	---	---	---	---	---	---	---
	standing.....	---	179	---	2	---	6	---	187	---	---	2
	SUBTOTAL.....	---	263	---	7	---	9	---	287	---	8	2
7. ASSAULT												
960	Struck by thrown or otherwise propelled object,while on	---	---	---	---	---	---	---	---	---	---	---
	loco-eqp std.....	---	12	---	1	---	2	---	24	---	9	---
961	Struck by thrown or otherwise propelled object,while on	---	---	---	---	---	---	---	---	---	---	---
	cab-eqp std.....	---	4	---	---	---	---	---	4	---	---	---
962	Struck by thrown or otherwise propelled object,while on	---	---	---	---	---	---	---	---	---	---	---
	car-eqp std.....	---	---	---	---	---	---	---	7	---	7	---
963	Struck by thrown or otherwise propelled object, not on	---	---	---	---	---	---	---	---	---	---	---
	on-track eqp.....	1	33	---	---	1	1	47	---	13	---	---
964	Other assaults to persons on trains - equipment	---	---	---	---	---	---	---	---	---	---	---
	standing.....	---	25	---	2	---	---	---	159	---	132	---
969	Other assualts to persons not on trains.....	1	194	---	---	4	8	500	7	302	2	---
	SUBTOTAL.....	2	268	---	3	---	7	9	741	7	463	2
8. OTHER CAUSES												
970	Performing rerailling or other clearing operations.....	---	126	---	7	---	16	---	150	---	1	3
978	Motor vehicle acc/inc (other than rail-highway grade	---	---	---	---	---	---	---	---	---	---	---
	crossing).....	13	765	---	19	---	17	13	832	---	31	1
979	Servicing and maintenance of highway vehicles.....	---	59	---	2	---	2	---	64	---	1	1
980	Horseplay.....	---	30	---	2	---	1	---	35	---	2	2
981	Animal bites, including snake bites.....	---	37	---	1	---	---	---	47	---	9	2
982	Insect bites.....	---	356	---	9	---	13	---	384	---	6	68
989	Other accidents/incidents.....	10	1,070	1	26	---	72	13	1,574	2	406	131
	SUBTOTAL.....	23	2,443	1	66	---	121	26	3,086	2	456	208
	SUBTOTAL.....	46	10,273	1	315	---	655	61	15,507	14	4,264	364
GRAND TOTAL.....		78	46,617	1	1,314	3	2,473	97	56,940	15	6,536	1,645

TABLE 160-A TRAIN ACCIDENTS
BY TYPE OF TRAIN BY TYPE OF TRACK, DOLLAR DAMAGES
CLASS I AND CLASS II RAILROADS, 1977

	Main		Yard		Siding		Industry		Unknown		Total	
	Equip (\$)	Track (\$)	Equip (\$)	Track (\$)	Equip (\$)	Track (\$)	Equip (\$)	Track (\$)	Equip (\$)	Track (\$)	Equip (\$)	Track (\$)
Collisions												
Freight.....	14,479,627	2,015,328	1,689,827	115,200	2,884,181	55,570	92,795	13,607	1,800	---	19,148,230	2,199,705
Passenger.....	214,368	5,000	48,175	5,970	---	---	---	---	---	---	262,543	10,970
Mixed.....	3,050	114	47,325	245	---	---	---	---	---	---	50,375	359
Work.....	453,051	650	13,125	1,165	10,500	---	4,000	---	6,000	---	486,676	1,815
Single Car.....	326,477	8,100	444,459	25,943	21,374	---	46,293	4,115	---	---	838,603	38,158
Cut of Cars.....	631,730	4,880	1,643,956	91,821	321,643	26,438	306,468	20,401	4,935	---	2,908,732	143,540
Yard/Switching....	357,181	3,881	3,507,649	355,019	20,000	371	165,309	17,744	37,017	---	4,087,156	377,015
Light Loco(s).....	1,595,227	11,753	1,334,033	37,048	161,768	225	127,600	---	---	---	3,218,628	49,026
Unknown.....	153,135	22,114	55,120	19,134	20,412	4,040	6,000	---	350	---	235,017	45,288
Subtotal.....	18,213,846	2,071,820	8,783,669	651,545	3,439,878	86,644	748,465	55,867	50,102	---	31,235,960	2,865,876
Derailments												
Freight.....	131,361,413	38,522,071	11,593,312	3,976,549	3,118,425	1,328,225	1,961,742	392,670	663,409	59,931	148,698,301	44,279,446
Passenger.....	2,614,936	181,715	51,530	19,834	120,000	815	---	---	---	---	2,786,466	202,364
Mixed.....	1,072,850	184,047	345,135	17,687	28,700	5,400	2,050	1,360	20,450	2,375	1,469,185	210,869
Work.....	279,408	146,522	9,150	18,453	72,912	4,178	300	22,384	---	---	361,770	191,537
Single Car.....	318,646	30,566	120,258	7,438	133,311	8,229	20,200	812	5,400	3,831	597,815	50,876
Cut of Cars.....	456,663	111,125	1,462,524	571,702	385,201	11,090	253,654	21,493	1,973	---	2,580,892	717,383
Yard/Switching....	697,394	374,382	11,723,545	3,319,813	93,439	52,391	684,315	219,899	12,160	4,570	13,210,853	3,971,055
Light Loco(s).....	223,119	103,631	329,709	120,315	83,800	50,720	30,000	1,500	---	---	666,628	276,166
Unknown.....	1,140,834	883,015	149,969	212,494	27,155	36,344	178,172	---	114,662	109,290	1,610,792	1,241,143
Subtotal.....	138,165,263	40,537,074	25,785,132	8,264,285	4,062,943	1,497,392	3,130,433	660,118	838,931	181,970	171,982,702	51,140,839
Other												
Freight.....	9,416,738	1,560,184	323,528	528,008	84,465	2,614	111,511	13,600	31,100	---	9,967,342	2,104,406
Passenger.....	3,424,217	224,561	71,042	---	---	---	---	---	1,713,825	1,500	5,209,084	226,061
Mixed.....	3,900	1,968	---	---	---	---	---	---	---	---	3,900	1,968
Work.....	223,127	19,312	86,516	---	92,877	---	150,000	---	17,600	---	570,120	19,312
Single Car.....	36,413	5,630	545,141	3,591	31,200	2,500	67,200	8,929	85,700	8,500	765,654	29,150
Cut of Cars.....	36,500	5,445	799,656	43,706	9,350	---	143,762	33,681	---	---	989,268	82,832
Yard/Switching....	34,775	31,950	450,392	60,634	---	200	167,947	475	---	---	653,114	93,259
Light Loco(s).....	464,068	10,378	83,429	19,800	32,500	---	25,000	250	---	---	604,997	30,428
Unknown.....	17,000	124,554	276,000	203,000	---	---	7,500	---	200,000	46,010	500,500	373,564
Subtotal.....	13,656,738	1,983,982	2,635,704	858,739	250,392	5,314	672,920	56,935	2,048,225	56,010	19,263,979	2,960,980
Total												
Freight.....	155,257,778	42,097,583	13,606,667	4,619,757	6,087,071	1,386,409	2,166,048	419,877	696,309	59,931	177,813,873	48,583,557
Passenger.....	6,253,521	411,276	170,747	25,804	120,000	815	---	---	1,713,825	1,500	8,258,093	439,395
Mixed.....	1,079,800	186,129	392,460	17,932	28,700	5,400	2,050	1,360	20,450	2,375	1,523,460	213,196
Work.....	955,586	166,484	108,791	19,618	176,289	4,178	154,300	22,384	23,600	---	1,418,566	212,664
Single Car.....	681,536	44,296	1,109,858	36,972	185,885	10,729	133,693	13,856	91,100	12,331	2,202,072	118,184
Cut of Cars.....	1,124,893	121,450	3,906,136	707,229	716,194	37,528	703,884	75,575	27,785	1,973	6,478,892	943,755
Yard/Switching....	1,089,350	410,213	15,681,586	3,735,466	113,439	52,962	1,017,571	238,118	49,177	4,570	17,951,123	4,441,329
Light Loco(s).....	2,282,414	125,762	1,747,171	177,163	278,068	50,945	182,600	1,750	---	---	4,490,253	355,620
Unknown.....	1,310,969	1,029,683	481,089	434,628	47,567	40,384	191,672	---	315,012	155,300	2,346,309	1,659,995
Subtotal.....	170,035,847	44,592,876	37,204,505	9,774,569	7,753,213	1,589,350	4,551,818	772,920	2,937,258	237,980	222,482,641	56,967,695

**TABLE 161-A TRAIN ACCIDENTS
DOLLAR DAMAGE BY SPEED OF TRAIN, 1977
CLASS I AND CLASS II RAILROADS**

Speed	Total Accidents	Track Caused	Equip Damage \$	Track Damage \$	Total Damage \$
1- 10	6,354	3,238	53,216,123	17,873,228	71,089,351
11- 20	1,065	404	23,642,988	9,654,393	33,297,381
21- 30	1,011	399	42,399,540	10,718,497	53,118,037
31- 40	514	118	35,390,892	5,925,704	41,316,596
41- 50	362	49	27,660,647	5,723,671	33,384,318
51- 60	128	8	9,649,351	2,011,493	11,660,844
61- 70	38	4	7,452,090	1,272,499	8,724,589
71- 80	15	0	5,659,756	96,142	5,755,898
81-100	2	0	86,000	4,950	90,950
101-200	1	0	4,400	0	4,400
Unknown	872	117	17,320,854	3,687,118	21,007,972
Total	10,362	4,337	222,482,641	56,967,695	279,450,336

**TABLE 161-B RAPID TRANSIT ACCIDENTS
DOLLAR DAMAGE BY SPEED OF TRAIN, 1977**

Speed	Total Accidents	Track Caused	Equip Damage \$	Track Damage \$	Total Damage \$
1- 10	39	6	1,673,243	66,074	1,739,317
11- 20	7	0	140,034	64,134	204,168
21- 30	5	0	156,600	8,200	164,800
31- 40	1	0	6,646	0	6,646
41- 50	1	0	600,000	18,100	618,100
51- 60	0	0	0	0	0
61- 70	0	0	0	0	0
71- 80	0	0	0	0	0
81-100	0	0	0	0	0
101-200	0	0	0	0	0
Unknown	7	1	529,578	4,350	533,928
Total	60	7	3,106,101	160,858	3,266,959

**TABLE 162-A TRAIN ACCIDENTS WITH DOLLAR DAMAGES
BY FRA TRACK CLASSIFICATION
CLASS I AND CLASS II RAILROADS, 1977**

FRA Class	Total Accidents	Track Caused	Equip Damage \$	Track Damage \$	Total Damage \$
1	4,812	2,384	48,413,702	12,897,668	61,311,370
2	1,655	733	33,790,208	12,117,520	45,907,728
3	1,590	546	58,715,848	13,971,168	72,687,016
4	959	180	52,313,503	10,238,722	62,552,225
5	221	21	17,575,925	5,133,885	22,709,810
6	20	3	275,098	162,579	437,677
UNKNOWN	1,105	470	11,398,357	2,446,153	13,844,510
TOTAL	10,362	4,337	222,482,641	56,967,695	279,450,336

TABLE 200-A SUMMARY OF OPERATIONAL MILES AND PASSENGERS CARRIED
BY CLASS I AND CLASS II RAILROADS, 1977

	Locomotive Train Miles	Motor Train Miles	Yard Switching Miles	Total Train Miles
CLASS I RAILROADS (LINE-HAUL)				
EASTERN DISTRICT				
Antrak	28,149,563	---	---	28,149,563
Antrak (Northeast Corridor)	5,576,697	3,049,502	598,206	9,224,405
Baltimore and Ohio Railroad Company	15,907,528	217,998	7,075,458	23,200,984
Bangor and Aroostook Railroad Company	555,698	---	157,002	712,700
Bessemer and Lake Erie Railroad Company	777,559	---	232,003	1,009,562
Boston and Maine Corporation	1,784,832	1,518,399	1,009,729	4,312,960
Canadian Pacific Lines in Maine	454,876	---	---	454,876
Central Vermont Railroad Incorporated	293,303	---	64,825	358,128
Chesapeake and Ohio Railway Company	11,649,912	---	4,971,986	16,621,898
Chicago and Illinois Midland	136,285	---	72,695	208,980
Consolidated Rail Corporation	54,781,730	13,035,459	34,940,300	102,757,489
Delaware and Hudson Railway Company	2,211,676	---	511,667	2,723,343
Detroit Toledo Shore Line Railroad Comp	161,195	---	213,732	374,927
Detroit, Toledo and Ironton Railroad Co	1,130,662	---	579,843	1,710,505
Elgin, Joliet and Eastern Railway Compa	759,986	---	2,089,274	2,849,260
Grand Trunk Western Railroad Company	2,942,491	---	2,741,955	5,684,446
Illinois Terminal Railroad Company	245,002	---	467,122	712,124
Long Island Railroad Company	1,918,227	5,593,845	884,277	8,396,349
Maine Central Railroad Company	770,962	---	455,106	1,226,068
Missouri-Illinois Railroad Company	166,297	---	100,322	266,619
Norfolk and Western Railway Company	17,520,264	---	9,880,974	27,401,238
Pittsburgh and Lake Erie Railroad Compa	378,105	---	1,200,364	1,578,469
Richmond Fredericksburg and Potomac Rai	2,217,156	---	561,342	2,778,498
Western Maryland Railway Company	1,247,117	---	455,586	1,702,703
SUBTOTAL, EASTERN DISTRICT	151,937,123	23,415,203	69,263,768	244,616,094
SOUTHERN DISTRICT				
Alabama Great Southern Railroad Company	2,262,402	---	699,442	2,961,844
Auto-train Corporation	1,019,292	---	56,760	1,076,052
Central of Georgia Railway Company	2,387,016	---	1,093,803	3,480,819
Cincinnati, New Orleans & Texas Pac. Rv	3,471,984	---	1,003,401	4,475,385
Clinchfield Railroad Company	1,032,673	---	366,150	1,398,823
Florida East Coast Railway Company	2,120,780	---	715,675	2,836,455
Georgia Railroad Lessee Organization	294,530	---	516,486	811,016
Georgia Southern and Florida Railway Co	1,062,910	---	197,005	1,259,915
Illinois Central Gulf Railroad Company	17,384,325	1,351,845	7,011,230	25,747,400
Louisville and Nashville Railroad Compa	18,834,153	---	9,390,852	28,225,005
Norfolk Southern Railway Company	654,233	---	162,356	816,589
Seaboard Coast Line Railroad Company	21,106,348	---	8,302,051	29,408,399
Southern Railway Company	17,828,537	---	6,534,629	24,363,166
SUBTOTAL, SOUTHERN DISTRICT	89,459,183	1,351,845	36,049,840	126,860,868
WESTERN DISTRICT				
Atchison Topeka and Santa Fe Railway Co	44,519,259	---	10,029,805	54,549,064
Burlington Northern Inc	43,871,926	3,500,384	17,596,467	64,968,777
Chicago and North Western, Transportati	12,010,077	2,426,513	6,167,262	20,603,852
Chicago, Milw. St. Paul and Pacific R.R.	12,708,709	---	4,960,169	17,668,878
Chicago, Rock Island and Pacific Railro	9,626,306	---	3,765,902	13,392,208
Colorado and Southern Railway Company	1,083,623	---	112,698	1,196,321
Denver and Rio Grande Western Railroad	4,648,636	---	1,439,448	6,288,084
Duluth Missabe and Iron Range Railway C	354,897	---	292,086	646,983
Duluth, Winnipeg and Pacific Railway Co	455,957	---	141,735	597,692
Fort Worth and Denver Railway Company	1,324,939	---	439,554	1,764,493
Kansas City Southern Railway Company	1,814,350	---	1,354,162	3,168,512
Missouri-Kansas-Texas Railroad Company	2,735,182	---	1,413,605	4,148,787
Missouri Pacific Railroad Company	24,793,522	---	9,856,332	34,649,854
Northwestern Pacific Railroad Company	329,804	---	92,303	422,107
St. Louis-San Francisco Railway Company	9,698,118	---	3,613,616	13,311,734
St. Louis Southwestern Railway Company	5,029,860	---	1,391,364	6,421,224
Soo Line Railroad Company	4,538,161	---	2,034,451	6,572,612
Southern Pacific Transportation Company	32,414,219	---	12,663,318	45,077,537
Texas Mexican Railway Company	123,284	---	121,090	244,374
Toledo, Peoria and Western Railroad Com	385,430	---	138,668	524,098
Union Pacific Railroad Company	32,196,591	---	7,017,840	39,214,431
Western Pacific Railroad Company	3,706,186	---	843,655	4,549,841

(CONT.)

TABLE 200-A SUMMARY OF OPERATIONAL MILES AND PASSENGERS CARRIED
BY CLASS I AND CLASS II RAILROADS, 1977

	Locomotive Train Miles	Motor Train Miles	Yard Switching Miles	Total Train Miles
WESTERN DISTRICT (CONT.)				
SUBTOTAL, WESTERN DISTRICT	248,569,036	5,926,897	85,485,530	339,981,463
CLASS I RAILROADS (SWITCHING AND TERMINAL)				
EASTERN DISTRICT				
Aliquippa and Southern Railroad	---	---	528,804	528,804
Alton and Southern Railway Company	---	---	1,051,012	1,051,012
Baltimore and Ohio Terminal Railroad	---	---	1,070,172	1,070,172
Belt Railway Company of Chicago	---	---	1,141,846	1,141,846
Chicago Union Station Station	---	---	---	---
Conemaugh and Black Lick Company Compan	---	---	462,466	462,466
Cuyahoga Valley Railway Company	---	---	430,968	430,968
Indiana Harbor Belt Railroad Company	---	---	2,587,601	2,587,601
Lakefront Dock and Railroad Terminal	---	---	61,968	61,968
Lake Terminal Railroad	---	---	302,501	302,501
Monongahela Connecting Railroad Company	---	---	318,792	318,792
Patapsco and Back Rivers Railroad Compa	---	---	561,312	561,312
Philadelphia, Bethlehem and New England	---	---	422,628	422,628
South Buffalo Roadway Company	---	---	767,452	767,452
Union Railroad Company (Penna)	---	---	2,276,694	2,276,694
SUBTOTAL, EASTERN DISTRICT	---	---	11,984,216	11,984,216
SOUTHERN DISTRICT				
Birmingham Southern Railroad	---	---	707,028	707,028
Kentucky and Indiana Terminal Railroad	---	---	545,778	545,778
SUBTOTAL, SOUTHERN DISTRICT	---	---	1,252,806	1,252,806
WESTERN DISTRICT				
Houston Belt Terminal Railway Company	---	---	1,089,696	1,089,696
Kansas City Terminal Railway Company	---	---	155,094	155,094
Terminal Railroad Association of St. Lo	---	---	2,281,404	2,281,404
Tx Pac-Mo Pac. Term RR of New Orleans	---	---	507,756	507,756
SUBTOTAL, WESTERN DISTRICT	---	---	4,033,950	4,033,950
CLASS II RAILROADS				
SUBTOTAL,	9,113,675	1,725,477	10,473,742	21,312,894
RECAPITULATION				
ALL DISTRICTS				
CLASS I RAILROADS (LINE-HAUL)	489,965,342	30,693,945	190,799,138	711,458,425
CLASS I RAILROADS (SWITCHING AND TERMINAL)	---	---	17,270,972	17,270,972
CLASS II RAILROADS	9,113,675	1,725,477	10,473,742	21,312,894
TOTAL...	499,079,017	32,419,422	218,543,852	750,042,291

TABLE 200-B SUMMARY OF OPERATIONAL MILES AND PASSENGERS CARRIED
BY RAPID TRANSIT RAILROADS, 1977

	Passenger Car Miles	Revenue Passengers Carried
Bay Area Rapid Transit BART	22,641,487	35,715,462
Chicago Transit Authority	48,763,625	118,222,910
Cleveland Transit System	3,157,223	10,777,609
Massachusetts Bay Transit Authority	10,637,476	73,549,814
New York City Transit Authority MTA	229,480,234	998,303,083
Port Authority Transit - Trans Hudson	10,484,400	40,313,712
Port Authority Transit - Lindenwood Line	3,979,961	10,995,669
Staten Island Rapid Transit Operating Authority	1,865,210	4,217,131
Southeastern Pennsylvania Transportation Authority	12,516,565	48,745,990
Washington Metropolitan Area Transit Authority	3,112,334	17,875,170
TOTAL - All Rapid Transit Carriers	346,638,515	1,358,716,550

TABLE 201-A TRAIN ACCIDENTS
CLASS I AND

	Collisions.....						Derailments.....		
	Defects.....						Defects.....		
	Human Factor	Equip	Track	Other	Total	Damages (\$)	Human Factors	Equip	Track
CLASS I RR (LINE-HAUL)									
EASTERN DISTRICT									
Astrak.....	4	---	---	---	4	181,302	---	6	3
Astrak - Northeast Corridor.....	12	---	---	3	15	172,087	13	8	18
Baltimore and Ohio Railroad.....	31	3	1	5	40	836,262	33	65	146
Bangor and Arcostock Railroad.....	3	1	---	---	4	47,061	---	3	5
Bessemer and Lake Erie Railroad.....	---	1	---	---	---	3,206	---	2	1
Boston and Maine Corporation.....	2	---	---	---	2	50,400	1	4	18
Canadian Pacific Railway Company.....	---	---	---	---	---	---	2	---	1
Central Vermont.....	1	---	---	---	1	18,704	1	1	1
Chesapeake and Ohio Railway Company.....	38	2	2	9	51	685,508	32	59	90
Chicago and Illinois Midland Railway.....	1	---	---	---	1	11,500	1	2	---
Consolidated Rail Corp.....	115	15	15	15	160	2,317,784	192	227	750
Delaware and Hudson Railroad.....	1	---	---	---	1	45,000	4	8	32
Detroit and Toledo Shore Line Railroad.....	---	---	---	---	---	---	1	1	5
Detroit, Toledo and Ironton Railroad.....	2	1	---	1	4	36,409	8	7	6
Elgin, Joliet and Eastern Railway..	10	---	---	3	13	156,305	9	1	12
Grand Trunk Western.....	16	---	---	---	16	166,243	24	15	18
Illinois Terminal Railroad.....	4	---	---	2	6	49,078	5	2	34
Long Island Railroad.....	1	---	---	2	3	119,900	3	4	5
Maine Central Railroad.....	7	---	1	---	8	76,572	4	6	5
Missouri-Illinois Railroad Co.....	---	---	---	---	---	---	---	---	---
Norfolk and Western Railway.....	32	1	4	2	39	269,571	28	40	60
Pittsburg and Lake Erie Railroad....	1	---	---	---	1	3,500	18	6	30
Richmond Fredericksburg Potomac RR	8	---	---	1	9	169,007	3	7	4
Western Maryland Railway.....	3	---	---	2	5	31,000	5	2	16
SUBTOTAL, EASTERN DISTRICT.....	290	24	23	45	382	5,448,399	389	475	1,262
SOUTHERN DISTRICT									
Alabama Great Southern Railroad....	2	---	---	---	2	9,400	2	8	5
Autotrain Corporation.....	---	---	---	---	---	---	1	1	---
Central of Georgia Railroad Company.....	1	1	---	---	1	15,650	10	3	30
Cinn., N.O. & Texas Pacific Rwy.....	2	---	---	1	3	14,690	2	9	4
Clinchfield Railroad.....	1	---	---	---	1	279,190	5	5	7
Florida East Coast Railway.....	3	---	---	1	4	60,203	1	---	16
Georgia Railroad.....	3	---	---	---	3	3,341	4	5	18
Georgia Southern & Florida Railway..	1	---	---	---	1	13,075	3	1	9
Illinois Central Gulf Railroad.....	50	4	1	7	62	1,252,809	57	75	283
Louisville and Nashville Railroad..	73	4	3	5	85	2,911,187	97	149	322
Norfolk Southern Railway.....	---	---	---	---	---	---	---	---	3
Seaboard Coast Line Railroad.....	58	5	5	4	72	681,153	122	85	280
Southern Railway.....	47	3	6	---	56	442,971	60	42	105
SUBTOTAL, SOUTHERN DISTRICT.....	241	17	15	19	292	5,663,669	364	383	1,072
WESTERN DISTRICT									
Atchison, Topeka and Santa Fe Railway.....	70	3	2	10	85	5,610,007	50	59	52
Burlington Northern.....	58	8	2	7	115	3,203,042	70	157	284
Chicago and North Western.....	61	4	3	5	73	1,251,119	59	95	393
Chi., Milw., St. Paul & Pacific Railroad.....	29	2	3	5	39	1,400,235	72	96	272
Chicago, Rock Island & Pacific Railroad.....	21	5	8	5	39	265,150	49	99	331
Colorado and Southern Railway.....	3	---	---	---	3	19,600	2	4	24
Denver and Rio Grande Western Railroad.....	---	---	---	---	---	---	1	7	7
Duluth, Missabe and Iron Range Railway.....	4	---	---	---	4	54,456	---	---	9
Duluth, Winnipeg and Pacific Railway.....	1	---	---	---	1	5,558	---	---	---
Fort Worth and Denver Railway.....	2	---	---	---	2	73,700	---	4	18
Kansas City Southern Railway.....	16	---	---	---	16	240,332	12	15	33
Missouri-Kansas-Texas Railroad.....	9	1	---	1	11	77,763	17	16	51
Missouri Pacific Railroad.....	22	2	4	3	31	1,364,465	26	61	71
Northwestern Pacific Railroad.....	---	---	---	---	---	---	1	---	---
St. Louis-San Francisco Railway....	28	3	3	2	36	476,860	29	23	60
St. Louis Southwestern Railway Company.....	12	1	---	---	13	130,530	24	24	17
Soo Line.....	23	1	---	1	25	825,147	26	24	50
Southern Pacific Trans. Company.....	84	3	2	4	93	2,253,156	83	145	128
Texas Mexican Railway Company.....	1	---	---	---	1	3,961	---	---	---
Toledo, Peoria and Western Railroad.....	4	---	---	---	4	92,800	3	1	11
Union Pacific Railroad.....	50	6	4	5	65	4,588,530	45	97	32
Western Pacific.....	14	1	---	1	16	208,795	12	13	7
SUBTOTAL, WESTERN DISTRICT.....	550	40	31	49	670	22,145,106	581	940	1,848
CLASS I RR (SWITCHING AND TERMINAL)									
EASTERN DISTRICT									
Aliquippa and Southern Railroad....	2	---	---	---	2	9,956	---	---	1
Altam and Southern Railroad.....	2	---	1	---	3	108,853	7	8	5
Balt. and Ohio Chicago Term. Railroad.....	5	---	---	1	6	21,892	7	2	8
Belt Railway Company of Chicago....	16	---	3	8	27	163,306	4	8	16

ACCIDENTS BY ACCIDENT TYPE AND BY CAUSE
CLASS II RAILROADS, 1977

		Other Defects										Total		
Other	Total	Damages (\$)	Human Factors	Equip	Track	Other	Total	Damages (\$)	Accidents	Acc/Mil Train Miles	Damages (\$)			
4	13	1,519,925	---	1	---	21	22	3,551,074	39	1.3	5,252,301			
7	46	739,667	7	22	1	14	44	1,085,978	105	11.3	1,997,752			
40	284	7,336,823	---	3	---	11	14	106,460	338	14.5	8,279,545			
5	13	388,683	---	---	---	---	---	---	17	23.8	435,744			
---	6	34,458	---	---	---	---	---	---	7	6.9	37,664			
6	29	667,080	---	2	---	10	12	181,350	43	9.9	898,630			
---	3	183,749	---	---	---	---	---	---	3	6.5	183,749			
---	3	7,376	---	---	---	1	1	2,582	5	13.9	28,662			
36	217	4,269,077	1	3	1	4	9	600,940	277	16.4	5,555,525			
---	3	92,550	---	---	---	---	---	---	4	19.1	104,050			
78	1,247	17,128,371	31	26	12	79	148	1,599,211	1,555	15.1	21,045,366			
3	47	2,396,660	2	---	---	---	1	3	35,750	51	16.7	2,477,410		
2	9	59,726	---	---	---	1	1	41,049	10	26.6	100,777			
3	24	196,580	---	---	1	1	2	7,728	30	17.5	243,117			
7	29	184,086	---	---	---	1	1	2,450	43	15.0	342,841			
4	61	5,852,992	---	1	---	5	6	213,453	81	14.2	6,232,688			
2	43	803,585	---	1	---	1	2	19,240	51	71.6	871,903			
3	15	247,796	3	---	---	1	4	24,422	22	2.6	392,118			
2	17	392,155	2	2	---	---	4	34,700	29	23.6	503,431			
---	---	---	---	---	---	---	---	---	---	0.0	---			
19	147	3,901,269	1	---	---	20	21	1,026,796	207	7.5	5,197,636			
2	56	1,257,055	---	1	---	---	1	3,950	58	36.7	1,264,509			
2	16	163,986	---	---	1	---	1	12,971	28	10.0	345,964			
6	29	847,640	---	1	1	---	2	13,975	36	21.1	892,615			
231	2,357	48,671,719	48	63	17	172	300	8,564,079	3,039	12.4	62,684,197			
---	15	196,750	1	---	---	---	2	9,500	19	6.4	215,650			
---	2	38,000	---	---	---	2	2	60,000	4	3.7	98,000			
1	44	4,205,450	---	---	---	5	5	25,585	52	14.9	4,246,685			
2	17	446,140	---	2	---	1	3	23,500	23	5.1	464,330			
15	32	2,770,288	---	---	---	3	3	15,403	36	25.7	3,064,881			
1	8	24,889	---	---	---	1	1	22,217	13	4.5	332,309			
2	29	200,852	1	---	---	---	1	21,000	33	40.6	225,193			
1	14	78,755	---	---	---	---	---	---	15	11.9	91,830			
38	453	11,528,905	1	5	1	59	66	671,664	581	22.5	13,453,376			
43	611	21,139,624	7	4	4	19	34	955,342	730	25.8	25,006,153			
---	3	85,700	---	---	---	2	2	8,200	5	6.1	93,900			
45	532	10,897,763	13	12	2	32	59	1,189,988	663	22.5	12,768,924			
12	219	3,610,406	2	5	---	14	21	531,350	296	12.1	4,584,727			
160	1,979	55,448,542	25	28	7	139	199	3,533,749	2,470	19.4	64,665,960			
24	185	7,342,578	5	18	---	22	45	1,372,961	315	5.7	14,325,946			
36	547	16,748,250	7	25	---	49	81	1,742,482	743	11.4	21,693,774			
81	628	14,316,322	1	7	---	14	22	293,663	723	35.0	15,863,104			
52	492	13,565,509	2	3	---	22	27	327,568	556	31.5	15,293,312			
25	504	7,592,616	1	4	---	20	25	325,111	568	42.4	8,182,877			
2	30	1,233,845	---	---	---	2	2	38,500	35	29.2	1,291,945			
---	15	834,036	1	---	---	1	2	31,114	17	2.7	865,152			
---	9	47,950	---	---	---	---	---	---	13	20.0	102,406			
2	2	95,808	---	---	---	1	1	5,000	4	6.6	106,366			
---	22	761,226	---	4	---	4	8	155,659	32	18.1	990,585			
6	66	1,038,494	---	---	---	2	2	44,164	82	25.8	1,322,890			
3	87	2,331,735	2	---	---	11	13	292,529	111	26.7	2,702,027			
13	171	6,954,585	2	3	1	13	19	211,390	221	6.3	8,530,480			
---	1	4,500	---	---	---	---	1	10,150	12	4.7	14,650			
5	117	4,360,303	7	4	---	15	26	1,802,038	179	13.4	6,639,201			
1	66	2,629,413	2	2	---	7	11	173,334	90	14.0	2,933,277			
11	111	2,827,656	2	7	---	9	18	130,917	154	23.4	3,783,720			
33	389	12,587,081	7	25	---	33	65	1,227,229	547	12.1	16,067,466			
---	---	---	---	---	---	---	---	---	1	4.0	3,961			
2	17	692,350	---	---	---	2	2	11,075	23	43.8	796,225			
15	189	15,251,227	4	9	---	27	40	419,723	294	7.4	20,259,480			
3	35	499,782	5	9	---	7	21	539,707	72	15.8	1,248,284			
314	3,683	111,717,666	48	120	1	262	431	9,154,314	4,784	14.0	143,017,088			
2	3	20,973	---	---	---	---	---	---	5	9.4	30,929			
2	22	204,045	4	---	---	---	2	6	23,450	31	29.4	336,348		
3	20	120,146	---	---	---	---	---	---	26	24.2	142,038			
5	33	250,863	1	---	---	6	7	42,000	67	58.6	456,169			

TABLE 201-A TRAIN ACCIDENTS BY ACCIDENT TYPE AND BY CAUSE
CLASS I AND CLASS II RAILROADS, 1977

	Collisions.....					Derailments.....					Other Defects.....					Total.....						
	Human Factors	Equip	Track	Other	Total	Damages (\$)	Human Factors	Equip	Track	Other	Total	Damages (\$)	Human Factors	Equip	Track	Other	Total	Accidents	Acc/Mill Train Miles	Damages (\$)		
EASTERN DISTRICT (CONT.)																						
Chicago, Union Station.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---		
Coneaugh and Blacklick Railroad.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---		
Cuyahoga Valley Railway Company.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---		
Lake Erie Railroad.....	7	1	1	8	17	75,330	25	9	65	5	104	492,703	3	---	---	---	6	51,591	127	49.0		
Lakewood Dock and Railroad.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---		
Terminal.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---		
Lake Terminal Railroad Company.....	1	---	---	---	---	7,000	---	---	---	---	---	---	---	---	---	---	---	---	---	---		
Monongahela Connecting Railroad.....	2	---	---	---	---	3,552	1	---	---	---	---	24,350	---	---	---	---	---	---	---	---		
Monongahela and Back Rivers Railroad.....	---	---	---	---	---	18,418	1	2	4	---	7	24,614	---	---	---	---	---	---	---	---		
Philad. Bethlehem and New Eng. Railroad.....	---	---	---	---	---	---	1	---	---	---	---	5,100	---	---	---	---	---	---	---	---		
South Buffalo Railway.....	3	---	---	---	---	14,032	---	---	---	---	---	25,743	---	---	---	---	---	---	---	---		
Union Railroad (Penn.).....	2	---	---	---	---	5,186	3	1	17	3	24	83,723	---	---	---	---	1	2,566	27	91.475		
SUBTOTAL, EASTERN DISTRICT.....	41	1	5	18	65	427,525	50	32	120	20	222	1,255,816	8	1	1	10	20	119,607	307	25.6		
SOUTHERN DISTRICT																						
Birmingham Southern Railroad.....	---	---	---	---	---	---	---	---	---	---	---	35,300	---	---	---	---	---	---	---	---		
Kentucky and Indiana Terminal Railroad.....	3	2	---	2	7	47,326	---	1	6	2	9	42,080	---	---	---	---	1	6,350	17	31.1		
INDIANA TERMINAL RAILROAD.....	3	2	---	2	7	47,326	---	1	8	3	12	77,380	---	---	---	---	1	6,350	20	15.9		
WESTERN DISTRICT																						
Houston Belt and Terminal Railway.....	5	---	---	---	---	81,930	12	3	2	1	18	71,095	1	---	---	---	---	---	---	---		
Kansas City Terminal Railway.....	---	---	---	---	---	---	9	6	4	---	20	296,787	---	---	---	---	---	---	---	---		
Port Terminal RR Assoc.....	2	---	---	---	---	29,300	---	2	5	---	7	107,216	---	---	---	---	1	2,978	10	14.5		
Terminal Railroad Association of St. Louis.....	8	1	---	---	---	47,886	9	3	20	2	34	154,665	---	---	---	---	---	---	43	18.6		
Texas Pacific-Missouri Pacific.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---		
Terminal Rail.....	---	---	---	---	---	---	---	---	---	---	---	8,310	---	---	---	---	---	---	2	3.9		
WESTERN DISTRICT.....	15	1	---	1	17	159,116	30	14	33	4	81	638,073	1	---	---	---	1	2	11,774	100	21.2	
RECAPITULATION																						
ALL DISTRICTS																						
Class I RR (line-haul).....	1,013	78	66	101	1,258	33,277,174	1,250	1,693	3,936	659	7,738	215,837,929	114	199	23	544	880	21,252,142	9,676	13.6		
Class I RR (switching and yard).....	52	2	5	20	79	633,967	70	40	135	24	269	1,971,269	7	1	1	11	20	137,731	368	20.5		
Class II Railroads.....	20	2	1	2	25	150,695	31	45	168	22	266	5,314,343	2	4	2	19	27	835,086	318	15.4		
TOTAL FOR ALL RAILROADS.....	1,065	82	72	123	1,362	34,101,836	1,351	1,778	4,239	705	8,073	223,123,541	123	204	26	574	927	22,224,959	10,362	14.7		

NOTE: Accidents involving more than one railroad are counted against each carrier in the detail lines. In the recapitulation these accidents are counted once.

NOTE: Accidents involving more than one railroad are counted against each carrier in the detail lines. In the recapitulation these accidents are counted once.

TABLE 201-B TRAIN ACCIDENTS BY ACCIDENT TYPE AND BY CAUSE
RAILROAD TRANSIT COMPANIES, 1977

RAPID TRANSIT CARRIERS, 1977																								
	Collisions.....					Derailments.....					Other Defects.....					Total.....								
	Human Factor	Equip	Track	Other	Total	Damages (\$)	Human Factors	Equip	Track	Other	Total	Damages (\$)	Human Factors	Equip	Track	Other	Total	Damages (\$)	Accidents	Acc/Mill Train Miles	Damages (\$)			
Bay Area Rapid Transit (BART).....																								
Chicago Transit Authority.....	5	---	---	---	---	20,000	1	---	---	---	---	2	37,123	1	3	---	---	8	324,194	7	0.3	371,416		
Cleveland Transit System.....	---	---	---	---	---	1,298,952	1	---	---	---	---	8	156,726	1	2	---	---	5	305,113	19	0.3	1,761,191		
Mass. Bay Transportation Authority.....	---	---	---	---	---	15,000	---	---	---	---	---	1	14,200	2	---	---	---	6,000	4	1.2	35,200			
New York City Transit Authority.....	---	---	---	---	---	6,550	---	---	---	---	---	1	6,550	1	1	---	---	3	16,070	4	0.3	22,620		
New York City Transit Authority (MTA).....																								
Port Authority Trans-Hudson.....	9	---	---	---	---	244,180	3	4	---	---	---	1	63,378	---	---	---	---	1	75,000	18	0.0	382,558		
Port Authority Trans-Manhattan (PATH).....	1	---	---	---	---	15,300	---	---	---	---	---	---	---	---	---	---	---	1	2,500	2	0.1	17,800		
Port Authority Trans-Manhattan (PATH).....																								
Staten Island Rapid Transit Oper. Auth.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	0.0	---		
Southeastern Pa. Trans. Authority.....																								
Washington Metro Transit Authority.....	1	---	---	---	---	120,000	---	---	---	---	---	---	---	---	---	---	---	---	---	---	0.0	---		
TOTAL.....	17	---	1	2	20	2,331,532	5	5	6	5	21	275,346	5	9	---	---	5	19	659,879	60	0.1	3,266,759		

Railroad	..Collisions..		..Derailments..		...Other....		Totals		Miles (000)	Kil/Mil	Inj/Mil	Miles
	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Injured				
CLASS I RR (LINE-HAUL)												
EASTERN DISTRICT												
Atsrah.....	---	---	---	28	---	33	---	61	28,149	0.00	2.16	
Atsrah - Northeast Corridor.....	---	---	---	1	---	---	---	1	9,224	0.00	0.70	
Baltimore and Ohio Railroad.....	---	5	---	17	3	14	3	36	23,200	0.12	1.55	
Bangor and Aroostook Railroad.....	---	---	---	---	---	---	---	---	712	0.00	0.00	
Bessemer and Lake Erie Railroad.....	---	---	---	---	---	---	---	---	1,009	0.00	0.00	
Boston and Maine Corporation.....	---	3	---	---	---	---	3	---	4,312	0.00	0.69	
Canadian Pacific Railway Company.....	---	---	---	---	---	---	---	---	454	0.00	0.00	
Central Vermont.....	---	---	---	11	1	2	---	---	358	0.00	0.00	
Chesapeake and Ohio Railway Company.....	---	7	---	---	---	---	1	20	16,821	0.05	1.18	
Chicago and Illinois Midland Railway.....	---	---	---	---	---	---	---	---	208	0.00	0.00	
Cincinnati Mail Co.....	---	30	---	55	8	37	8	122	102,757	0.07	1.18	
Delaware and Hudson Railroad.....	---	---	---	---	---	---	---	---	2,723	0.00	0.00	
Detroit and Toledo Shore Line Railroad.....	---	---	---	2	---	3	---	5	374	0.00	13.33	
Detroit, Toledo and Ironton Railroad.....	---	---	---	---	---	---	---	---	1,710	0.00	0.00	
Elgin, Joliet and Eastern Railway.....	---	7	---	1	---	---	---	8	2,849	0.00	2.80	
Grand Trunk Western.....	---	3	---	8	3	9	3	20	5,684	0.52	3.51	
Illinois Terminal Railroad.....	---	---	---	---	---	---	---	---	712	0.00	0.00	
Long Island Railroad.....	---	---	---	1	---	1	---	2	8,396	0.00	0.23	
Maine Central Railroad.....	---	1	---	---	---	---	---	2	1,226	0.00	1.63	
Missouri-Illinois Railroad Co.....	---	---	---	---	---	---	---	---	286	0.00	0.00	
Norfolk and Western Railway.....	---	2	---	10	6	17	6	29	27,401	0.21	1.05	
Pittsburg and Lake Erie Railroad.....	---	---	---	---	---	---	---	---	1,578	0.00	0.00	
Richmond Fredericksburg Potomac RR.....	---	---	---	---	---	---	---	---	2,778	0.00	0.00	
Western Maryland Railway.....	---	---	---	---	3	---	3	---	1,702	0.00	1.76	
SUBTOTAL, EASTERN DISTRICT.....	---	58	---	134	21	120	21	312	244,616	0.08	1.27	
SOUTHERN DISTRICT												
Alabama Great Southern Railroad.....	---	---	---	2	---	---	---	---	2,961	0.00	0.00	
Autotrain Corporation.....	---	---	---	---	---	---	3	---	1,076	0.00	2.78	
Central of Georgia Railroad Company.....	---	---	---	1	4	3	4	---	3,480	1.16	1.14	
Cinn., M.O. & Texas Pacific Rwy.....	---	---	---	---	---	1	---	1	4,475	0.00	0.22	
Clinchfield Railroad.....	---	3	1	---	---	2	1	5	1,398	0.71	3.57	
Florida East Coast Railway.....	---	---	---	---	---	---	---	---	2,836	0.00	0.00	
Georgia Railroad.....	---	---	---	1	---	1	---	---	811	0.00	2.46	
Georgia Southern & Florida Railway.....	---	2	---	---	---	---	2	---	1,259	0.00	1.58	
Illinois Central Gulf Railroad.....	---	9	---	26	3	23	3	5	25,747	0.11	2.25	
Louisville and Nashville Railroad.....	---	15	2	22	3	11	5	48	28,225	0.17	1.70	
Norfolk Southern Railway.....	---	---	---	---	---	---	---	---	816	0.00	0.00	
Seaboard Coast Line Railroad.....	---	8	1	27	20	36	21	71	29,408	0.71	2.41	
Southern Railway.....	---	3	1	30	2	13	3	46	24,363	0.12	1.88	
SUBTOTAL, SOUTHERN DISTRICT.....	---	40	5	109	32	91	37	240	126,860	0.29	1.89	
WESTERN DISTRICT												
Atchison, Topeka and Santa Fe Railway.....	---	15	---	9	1	11	1	35	54,549	0.01	0.64	
Burlington Northern.....	---	27	1	20	11	25	12	72	64,968	0.18	1.70	
Chicago and Northwestern.....	---	13	1	12	---	---	1	25	20,603	0.04	1.21	
Chi., Milw., St. Paul & Pacific Railroad..	1	10	---	11	3	4	4	25	17,668	0.22	1.41	
Chicago, Rock Island & Pacific Railroad.....	---	---	---	14	4	4	4	18	13,392	0.29	1.34	
Colorado and Southern Railway.....	---	---	---	---	---	---	---	---	1,196	0.00	0.00	
Denver and Rio Grande Western Railroad.....	---	---	---	1	---	---	---	1	6,288	0.00	0.15	
Duluth, Missabe and Iron Range Railway.....	1	---	---	---	---	---	1	---	646	1.54	0.00	
Galena, Waukegan and Pacific Railway.....	---	---	---	---	1	---	---	---	597	1.67	0.00	
Fort Worth and Denver Railway.....	---	2	---	---	---	3	---	5	1,764	0.00	2.83	
Kansas City Southern Railway.....	---	2	---	---	---	3	---	3	3,168	0.00	0.94	
Missouri-Kansas-Texas Railroad.....	---	---	---	1	1	3	1	4	4,148	0.24	0.96	
Missouri Pacific Railroad.....	---	2	1	8	5	11	6	21	34,649	0.17	0.60	
Northwestern Pacific Railroad.....	---	---	---	---	---	---	---	---	422	0.00	0.00	
St. Louis-San Francisco Railway.....	---	3	---	5	2	10	2	18	13,311	0.15	1.35	
St. Louis Southwestern Railway Company.....	---	2	---	3	---	3	---	8	6,421	0.00	1.24	
Soo Line.....	---	7	---	6	---	5	---	18	6,572	0.00	2.73	
Southern Pacific Trans. Company.....	1	21	---	38	8	19	9	78	45,077	0.20	1.73	
Texas Mexican Railway Company.....	---	---	---	---	---	---	---	---	248	0.00	0.00	
Toledo, Peoria and Western Railroad.....	---	---	---	---	---	---	---	---	524	0.00	1.90	
Union Pacific Railroad.....	1	14	---	10	2	12	3	36	39,214	0.07	0.91	
Western Pacific.....	---	7	---	1	1	8	1	16	4,549	0.22	3.51	
SUBTOTAL, WESTERN DISTRICT.....	4	126	3	139	39	119	46	384	339,981	0.13	1.12	
CLASS I RR (SWITCHING AND TERMINAL)												
EASTERN DISTRICT												
Albion and Southern Railroad.....	---	2	---	---	---	---	2	---	528	0.00	3.78	
Alton and Southern Railroad.....	---	---	---	---	---	1	---	1	1,051	0.00	0.95	
Balt. and Ohio Chicago Term. Railroad.....	---	---	---	---	---	---	---	---	1,070	0.00	0.00	
Belt Railway Company of Chicago.....	---	3	---	---	---	---	3	---	1,141	0.00	2.62	
Chicago, Union Station.....	---	---	---	---	---	---	---	---	---	0.00	0.00	

(CONT.)

TABLE 202-A CASUALTIES IN TRAIN ACCIDENTS
CLASS I AND CLASS II RAILROADS, 1977

Railroad	..Collisions..		..Derailments..		Other.....		Killed Injured		Totals		
	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Injured	Miles (000)	Kil/Mil Miles	Inj/Mil Miles
EASTERN DISTRICT (CONT.)											
Conecough and Black Lick Railroad.....	---	---	---	---	---	---	---	---	462	0.00	0.00
Cuyahoga Valley Railway Company.....	---	---	---	---	---	---	---	---	430	0.00	0.00
Indiana Harbor Belt Railroad.....	---	---	1	---	1	---	2	---	2,587	0.00	0.77
Lakefront Dock and Railroad Terminal.....	---	---	---	---	---	---	---	---	61	0.00	0.00
Lake Terminal Railroad Company.....	---	---	---	---	---	---	---	---	302	0.00	0.00
Monongahela Connecting Railroad.....	---	---	---	---	---	---	---	---	318	0.00	0.00
Patapsco and Back Rivers Railroad.....	---	---	---	---	---	---	---	---	561	0.00	0.00
Phila., Bethlehem and Nev Eng. Railroad.....	---	---	1	---	---	---	1	---	422	0.00	2.36
South Buffalo Railway.....	---	---	---	---	---	---	---	---	767	0.00	0.00
Union Railroad (Penna.).....	---	2	---	---	---	---	2	---	2,276	0.00	0.87
SUBTOTAL, EASTERN DISTRICT:.....	---	7	---	2	---	2	---	11	11,984	0.00	0.91
SOUTHERN DISTRICT											
Birmingham Southern Railroad.....	---	---	---	2	---	---	---	2	707	0.00	2.82
Kentucky and Indiana Terminal Railroad.....	---	---	---	---	---	---	---	---	545	0.00	0.00
SUBTOTAL, SOUTHERN DISTRICT:.....	---	---	---	2	---	---	---	2	1,252	0.00	1.59
WESTERN DISTRICT											
Houston Belt and Terminal Railway.....	---	---	---	---	---	---	---	---	1,089	0.00	0.00
Kansas City Terminal Railway.....	---	---	---	1	---	---	1	---	155	0.00	6.44
Port Terminal RR Assoc.....	---	---	---	---	1	---	1	---	668	0.00	1.49
Terminal Railroad Association of St. Louis.....	---	---	---	---	---	---	---	---	2,281	0.00	0.00
Texas Pacific-Missouri Pacific Terminal Rail.....	---	---	---	---	---	---	---	---	507	0.00	0.00
SUBTOTAL, WESTERN DISTRICT:.....	---	---	---	1	---	1	---	2	4,702	0.00	0.42
CLASS II RAILROADS											
SUBTOTAL, CLASS II:.....	---	1	---	12	4	21	4	34	20,644	0.19	1.64
RECAPITULATION ALL DISTRICTS											
Class I RR (Line-Haul).....	4	224	8	382	92	330	104	936	711,458	0.14	1.31
Class I RR (Switching and Terminal).....	---	7	---	5	---	3	---	15	17,939	0.00	0.83
Class II Railroads.....	---	1	---	12	4	21	4	34	20,644	0.19	1.64
TOTAL FOR ALL RAILROADS.....	4	232	8	399	96	354	108	985	750,042	0.14	1.31

TABLE 202-B CASUALTIES IN TRAIN ACCIDENTS
RAPID TRANSIT CARRIERS, 1977

Railroad	..Collisions..		..Derailments..		Other.....		Killed Injured		Totals		
	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Injured	Miles (000)	Kil/Mil Miles	Inj/Mil Miles
Bay Area Rapid Transit (BART).....	---	---	---	---	---	---	---	---	22,641	0.00	0.00
Chicago Transit Authority.....	11	207	---	1	---	---	11	208	48,763	0.22	4.26
Cleveland Transit System.....	---	4	---	---	---	---	---	4	3,157	0.00	1.26
Mass. Bay Transportation Authority.....	---	---	---	---	---	---	---	---	10,637	0.00	0.00
New York City Trans. Authority (MTA).....	---	5	---	---	---	2	---	7	229,480	0.00	0.03
Port Authority Trans-Hudson.....	1	---	---	---	---	---	1	---	10,484	0.09	0.00
Port Autho. Trans. (PATCO) Lindenwold Ln..	---	---	---	---	---	---	---	---	3,979	0.00	0.00
Staten Island Rapid Transit Oper. Auth.....	---	---	---	---	---	---	---	---	1,865	0.00	0.00
Southeastern Pa. Trans. Authority.....	---	2	---	---	---	---	---	2	12,516	0.00	0.16
Washington Metro Transit Authority.....	---	9	---	---	---	---	---	9	3,112	0.00	2.89
Total.....	12	227	---	1	---	2	12	230	346,638	0.03	0.66

TABLE 203 TRAIN INCIDENTS AND CASUALTIES BY CONTRIBUTING OCCURRENCES
CLASS I AND CLASS II RAILROADS, 1977

	Coupling		Operating		Operating		Operating		Contact With		Get		Acc At		Struck Or		...Other...		TOTAL.....					
	ACC	CAS	ACC	CAS	ACC	CAS	ACC	CAS	ACC	CAS	ACC	CAS	ACC	CAS	ACC	CAS	ACC	CAS	ACC	Man Hrs	Cas	Man Hrs		
CLASS I RR (Line-Haul)																								
EASTERN DISTRICT																								
Atlatk.....	4	4	1	1	---	---	---	---	1	1	4	4	35	37	5	5	183	185	233	6.28	237	6.38		
Antrak - Northeast Corridor.....	1	1	2	2	---	---	---	---	1	1	15	19	3	3	21	21	76	76	123	4.4	123	4.4		
Baltimore and Ohio Railroad.....	17	17	21	21	12	13	---	---	11	11	72	72	136	178	29	30	125	131	427	13.45	473	14.90		
Bangor and Aroostook Railroad.....	1	1	1	1	---	---	---	---	---	---	2	2	1	1	1	1	1	1	7	4.95	7	4.95		
Bessemer and Lake Erie Railroad.....	2	2	4	4	---	---	1	1	---	---	5	5	1	2	---	---	13	13	26	9.57	27	9.93		
Boston and Maine Corporation.....	1	1	9	11	---	---	---	---	2	2	10	10	19	23	10	10	14	20	65	10.47	77	12.40		
Canadian Pacific Railway Company.....	---	---	---	---	---	---	---	---	---	---	2	2	1	1	---	---	3	3	6	11.17	6	11.17		
Central Vermont.....	---	---	---	---	---	---	---	---	---	---	---	---	5	5	1	1	2	2	8	10.23	8	10.23		
Chesapeake and Ohio Railway Company.....	29	29	20	20	19	19	2	2	10	10	69	70	189	205	40	43	83	84	421	11.59	482	13.27		
Chicago and Illinois Midland Railway...	---	---	---	---	1	1	---	---	1	1	4	4	1	1	---	---	1	1	8	11.58	8	11.58		
Consolidated Rail Corp.....	83	85	179	184	18	19	4	4	20	20	200	202	322	435	122	126	864	884	1,812	9.70	1,959	10.48		
Delaware and Hudson Railroad.....	2	2	2	2	4	4	---	---	---	---	17	17	1	1	---	---	11	11	37	8.89	37	8.89		
Detroit and Toledo Shore Line Railroad...	1	1	1	1	---	---	---	---	---	---	4	4	6	6	---	---	7	7	19	35.32	19	35.32		
Detroit, Toledo and Irontrunk Railroad...	6	6	6	6	1	1	---	---	---	---	5	5	13	18	---	---	6	6	37	13.05	42	16.81		
Elgin, Joliet and Eastern Railway.....	6	6	5	5	1	1	---	---	3	3	23	23	15	18	4	4	50	53	109	19.47	115	20.54		
Grand Trunk Western.....	9	9	9	9	6	6	---	---	4	4	36	36	52	62	9	9	58	56	183	19.43	193	20.49		
Illinois Terminal Railroad.....	3	3	3	3	---	---	---	---	1	1	6	6	5	5	---	---	6	6	24	19.60	24	19.60		
Long Island Railroad.....	1	1	3	3	---	---	---	---	12	12	15	15	6	6	17	17	106	106	160	13.44	160	13.44		
Maine Central Railroad.....	9	9	6	6	1	1	---	---	1	1	7	8	10	11	1	1	14	15	49	19.09	52	20.26		
Missouri-Illinois Railroad Co.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---		
Norfolk and Western Railway.....	18	28	35	35	20	20	6	6	11	11	86	86	191	269	51	62	229	237	657	14.01	754	16.08		
Pittsburg and Lake Erie Railroad.....	---	---	---	---	1	1	---	---	2	2	5	5	2	4	2	2	15	15	27	6.23	29	6.89		
Richmond Fredericksburg Potomac RR.....	2	2	4	4	---	---	1	1	---	---	8	8	1	4	---	---	18	18	34	17.10	37	18.61		
Western Maryland Railway.....	1	1	2	2	1	1	---	---	---	---	4	4	8	10	3	3	7	7	26	11.13	28	11.99		
SUBTOTAL, EASTERN DISTRICT:..	208	210	313	320	85	87	14	14	80	80	603	607	963	1,305	316	335	1,856	1,939	4,498	11.29	4,897	12.29		
SOUTHERN DISTRICT																								
Alabama Great Southern Railroad.....	1	1	---	---	---	---	---	---	---	---	5	5	29	49	2	2	12	12	49	9.7	69	9.7		
Autotrain Corporation.....	---	---	---	---	---	---	---	---	---	---	---	---	1	1	---	---	89	89	90	70.59	90	70.59		
Central of Georgia Railroad Company....	5	5	1	1	3	3	---	---	1	1	17	17	22	30	6	6	36	36	91	9.7	91	9.7		
Cinn., N.O. & Texas Pacific Rwy.....	---	---	---	---	---	---	---	---	---	---	7	7	4	7	8	9	9	9	26	32	32	32		
Clinchfield Railroad.....	2	2	5	5	2	2	---	---	---	---	2	2	8	9	1	1	5	5	23	12.89	26	14.57		
Florida East Coast Railway.....	1	1	1	1	---	---	---	---	1	1	4	4	29	44	7	8	5	6	48	21.67	65	29.35		
Georgia Railroad.....	3	3	3	3	3	3	---	---	2	3	13	13	14	16	1	1	8	8	47	72.53	50	77.16		
Georgia Southern & Florida Railway.....	---	---	---	---	---	---	---	---	---	---	---	---	5	5	8	11	---	---	10	10	23	9.7	26	9.7
Illinois Central Gulf Railroad.....	41	42	49	49	11	11	21	21	28	28	65	85	184	252	39	43	163	168	621	16.56	699	18.65		
Louisville and Nashville Railroad.....	19	19	40	40	8	8	3	3	14	14	121	121	118	161	45	49	156	161	526	15.82	576	17.33		
Norfolk Southern Railway.....	3	3	---	---	---	---	---	---	---	---	9	9	9	11	1	1	5	5	27	9.7	29	9.7		
Seaboard Coast Line Railroad.....	44	44	38	39	8	8	2	2	11	11	144	144	281	407	54	55	167	170	749	18.90	880	22.20		
Southern Railway.....	12	12	3	3	6	6	1	1	5	5	66	66	196	250	70	76	165	169	543	13.46	605	15.00		
SUBTOTAL, SOUTHERN DISTRICT:..	131	132	140	141	41	41	26	26	58	59	498	498	901	1,248	234	253	836	848	2,865	18.29	3,246	20.72		
WESTERN DISTRICT																								
Atchison, Topeka and Santa Fe Railway..	36	38	33	33	16	16	6	6	12	12	110	112	217	297	48	53	115	118	595	9.78	685	11.26		
Burlington Northern.....	40	40	61	76	27	27	21	21	22	22	226	228	163	218	49	53	310	315	921	10.57	1,000	11.47		
Chicago and Northwestern.....	12	12	13	13	10	10	5	5	5	5	36	36	118	155	20	20	99	99	318	11.24	355	12.55		
Chi., Milw., St. Paul & Pacific Railroad.....	18	18	7	7	9	9	---	---	9	9	74	74	108	132	9	9	142	146	376	16.41	404	17.64		
Chicago, Rock Island & Pacific Railroad.....	14	14	21	21	4	4	1	1	3	3	44	49	80	120	10	14	95	96	272	16.16	322	19.14		
Colorado and Southern Railway.....	2	2	1	1	2	2	---	---	---	---	6	6	5	7	---	---	7	8	23	20.76	26	23.47		
Denver and Rio Grande Western Railroad...	3	3	5	5	5	5	2	2	1	1	11	11	12	15	3	3	26	26	68	9.30	72	9.85		
Duluth, Missabe and Iron Range Railway...	1	1	---	---	---	---	---	---	---	---	2	2	1	2	1	1	5	5	10	1.89	11	4.28		
Duluth, Winnipeg and Pacific Railway...	1	1	1	1	---	---	---	---	---	---	2	2	2	3	---	---	2	2	8	10.39	9	11.69		
Fort Worth and Denver Railway.....	1	1	---	---	2	2	---	---	---	---	9	9	7	11	1	1	11	11	31	14.33	35	16.16		
Kansas City Southern Railway.....	3	3	3	4	4	4	---	---	---	---	21	21	32	51	4	4	36	36	103	16.96	123	20.25		
Missouri-Kansas-Texas Railroad.....	---	---	---	---	---	---	---	---	---	---	2	2	8	8	76	9	10	58	58	141	26.87	170	32.39	
Missouri Pacific Railroad.....	32	35	46	52	14	14	1	1	6	6	86	87	350	496	57	65	188	190	782	19.38	948	24.10		
Northwestern Pacific Railroad.....	1	1	---	---	---	---	---	---	---	---	2	2	2	2	---	---	1	2	6	7.75	6	9.04		
St. Louis-San Francisco Railway.....	13	13	45	45	8	8	3	3	4	4	29	29	87	104	12	15	43	43	284	15.90	264	17.20		
St. Louis Northwestern Railway Company...	5	5	17	21	3	3	5	5	2	2	29	29	36	45	5	5	48	50	150	19.36	165	21.30		
Soo Line.....	18	18	6	6	3	3	1	1	3	3	40	40	76	91	4	4	70	71	221	24.28	237	26.03		
Southern Pacific Trans. Company.....	53	53	107	110	36	36	12	12	18	18	206	206	186	260	90	96	383	410	1,091	16.57	1,201	18.24		
Texas Mexican Railway Company.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---		
Toledo, Peoria and Western Railroad....	---	---	---	---	1	1	---	---	1	1	3	3	6	8	1	2	3	3	14	14.43	17	17.53		
Union Pacific Railroad.....	53	54	32	34	16	16	5	5	19	19	203	204	158	204	35	42	248	253	764	16.02	831	17.31		
Western Pacific.....	5	5	1	1	---	---	---	---	1	1	19	19	21	27	1	1	40	40	86	18.26	95	19.11		
SUBTOTAL, WESTERN DISTRICT:..	314	318	411	442	164	165	63	63	109	109	1,175	1,184	1,716	2,325	361	403	1,946	1,998	6,259	18.43	7,007	16.15		
CLASS I RR (Switching and Terminal)																								
EASTERN DISTRICT																								
Aliquippa and Southern Railroad.....	---	---	3	3	---	---	---	---	---	---	2	2	---	---	---	---	8	11	13	13.77	16	16.95		
Alton and Southern Railroad.....	3	3	2	2	---	---	---	---	---	---	2	2	2	3	1	1	2	2	12	11.14	13	12.07		
Balt. and Ohio Chicago Term. Railroad...	8	8	1	1	---	---	---	---	1	1	5	5	9	9	---	---	7	7	31	16.41	31	16.41		
Belt Railway Company of Chicago.....	4	4	1	1	1	1	---	---	---	---	8	8	2	3										

(CONT.)

TABLE 203 TRAIN INCIDENT CLASS

	Coupling		Operating		Operating		Operating		
	ACC	CAS	Locos/Str	Crs	Hand	Brakes	Switches		P
			ACC	CAS	ACC	CAS	ACC	CAS	
SOUTHERN DISTRICT (CONT.)									
SUBTOTAL, SOUTHERN DISTRICT:	1	1	2	2	---	---	---	---	---
WESTERN DISTRICT									
Houston Belt and Terminal Railway.....	5	5	1	1	1	1	---	---	---
Kansas City Terminal Railway.....	---	---	1	1	---	---	---	---	---
Port Terminal RR Assoc.....	4	4	5	5	1	1	---	---	---
Terminal Railroad Association of St. Louis.....	9	9	1	1	---	---	1	1	---
Texas Pacific-Missouri Pacific Terminal Rail.....	1	1	1	1	---	---	---	---	---
SUBTOTAL, WESTERN DISTRICT:..	19	19	9	9	2	2	1	1	---
CLASS II RAILROADS									
SUBTOTAL, CLASS II:.....	61	61	52	52	15	15	3	3	---
RECAPITULATION									
ALL DISTRICTS									
Class I RR (Line-Haul).....	653	660	664	903	290	293	103	103	---
Class I RR (Switching and Terminal)....	44	44	40	40	6	6	2	2	---
Class II Railroads.....	61	61	52	52	15	15	3	3	---
TOTAL FOR ALL RAILROADS.....	758	765	956	995	311	314	108	108	---

** Included in Amtrak

* Included in Southern Railway System

EVENTS AND CASUALTIES BY CONTRIBUTING OCCURRENCES
I AND CLASS II RAILROADS, 1977

Contact With ACC	Structure CAS	Get ...On Offi... ACC CAS		Acc At Pub Kings ACC CAS		Struck Or Run Over ACC CAS		...Other... ACC CAS		TOTAL.....			
		ACC	CAS	ACC	CAS	ACC	CAS	ACC	CAS	Acc ACC	Bill Man Hrs	Cas Cas	Bill Man Hrs
1	1	3	3	2	2	---	---	3	3	12	8.00	12	8.00
---	---	5	5	11	16	3	3	12	12	38	18.75	43	21.27
---	---	1	1	---	---	---	---	---	---	2	3.31	2	3.31
---	---	5	5	2	2	2	2	12	12	31	32.06	31	32.06
4	4	12	12	5	6	---	---	7	7	39	13.11	40	13.45
---	---	2	2	---	---	---	---	4	4	8	8.72	8	8.72
4	4	25	25	18	24	5	5	35	35	118	15.76	124	16.57
23	23	119	119	150	204	24	27	177	183	624	17.41	687	19.17
247	246	2,276	2,289	3,600	4,678	911	991	4,678	4,785	13,622	13.78	15,150	15.32
17	16	79	79	39	49	13	13	125	128	365	12.82	379	13.32
23	23	119	119	150	204	24	27	177	183	624	17.41	687	19.17
287	289	2,476	2,487	3,789	5,131	946	1,031	4,960	5,096	14,611	13.87	16,216	15.40

TABLE 204 CASUALTIES IN TRAIN INCIDENTS BY CAUSE
CLASS I AND CLASS II RAILROADS, 1977

	Coupling		Operating Locos/Tr Cts		Operating Hand Brakes		Operating Switches		Contact With Fixed Structure		Get On Off...		Acc At Pub Xings		Struck Or Run Over		Other...		TOTAL			
	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj	Acc/Mil Kiln Man Hrs	Cas/Mil Inj	Cas/Mil Man Hrs	
CLASS I RR (LINE-HAUL)																						
EASTERN DISTRICT																						
Antrak.....	---	4	---	1	---	---	---	---	1	---	4	4	33	4	1	1	184	9	24	228	6.14	
Antrak - Northeast Corridor.....	---	1	---	2	---	---	---	---	1	---	19	---	3	11	10	---	76	11	7	112	4	
Baltimore and Ohio Railroad.....	---	17	---	21	---	13	---	---	11	---	72	23	155	7	23	---	131	30	95	443	13.96	
Bangor and Aroostook Railroad.....	---	1	---	1	---	---	---	---	2	---	2	---	---	---	1	---	1	---	---	7	8.95	
Bessemer and Lake Erie Railroad.....	---	2	---	4	---	---	1	---	---	---	5	1	1	---	---	---	13	1	37	26	9.57	
Boston and Maine Corporation.....	---	1	---	11	---	---	---	---	2	---	10	1	22	7	3	---	20	8	1.29	69	11.11	
Canadian Pacific Railway Company.....	---	---	---	---	---	---	---	---	---	---	2	---	1	---	---	---	3	---	---	6	11.17	
Central Vermont.....	---	---	---	---	---	---	---	---	---	---	---	1	4	---	1	---	2	1	1.28	7	8.95	
Chesapeake and Ohio Railway Company.....	---	29	---	20	---	19	---	2	10	---	70	28	177	10	33	---	84	38	1.05	444	12.22	
Chicago and Illinois Midland Railway...	---	---	---	---	1	---	---	---	1	---	4	---	1	---	---	---	1	---	---	8	11.58	
Consolidated Rail Corp.....	2	83	---	184	---	19	---	4	1	19	4	198	96	339	53	73	3	881	159	85	1,800	9.63
Delaware and Hudson Railroad.....	---	2	---	2	---	4	---	---	---	---	17	---	---	---	---	---	11	---	---	37	8.89	
Detroit and Toledo Shore Line Railroad...	---	1	---	1	---	---	---	---	---	---	4	---	6	---	---	---	7	---	---	19	35.32	
Detroit, Toledo and Ironton Railroad.....	---	6	---	6	---	1	---	---	---	---	5	2	16	---	---	---	6	2	71	40	14.10	
Elgin, Joliet and Eastern Railway.....	---	8	---	5	---	1	---	---	3	---	23	2	16	---	---	---	53	2	36	113	20.18	
Grand Trunk Western.....	---	9	---	1	---	---	---	---	4	---	36	6	56	2	7	1	57	9	96	184	19.53	
Illinois Terminal Railroad.....	---	3	---	3	---	---	---	---	1	---	6	---	5	---	---	---	6	---	---	24	19.80	
Long Island Railroad.....	---	1	---	3	---	1	---	---	12	---	15	2	4	11	6	---	106	13	1.09	147	12.35	
Maine Central Railroad.....	---	9	---	6	---	1	---	---	1	---	8	2	9	---	---	---	15	2	78	50	19.48	
Missouri-Illinois Railroad Co.....	---	28	---	35	---	20	---	6	11	2	84	40	229	19	43	2	235	63	1.34	691	14.74	
Norfolk and Western Railway.....	---	3	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
Pittsburg and Lake Erie Railroad.....	---	2	---	4	---	1	---	1	2	---	5	---	4	---	---	---	15	---	---	29	6.69	
Richmond Fredericksburg Potomac RR.....	---	2	---	2	---	---	---	---	---	---	8	---	4	---	---	---	18	---	---	37	18.61	
Western Maryland Railway.....	---	1	---	4	---	1	---	---	---	---	4	5	5	---	3	---	7	5	2.74	23	9.85	
SUBTOTAL, EASTERN DISTRICT:..	2	208	---	320	---	87	---	14	1	79	6	601	213	1,092	124	211	7	1,932	353	89	4,544	11.40
SOUTHERN DISTRICT																						
Alabama Great Southern Railroad.....	---	1	---	---	---	---	---	---	---	---	5	4	45	2	---	---	12	6	---	63	---	
Autotrain Corporation.....	---	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	89	---	---	70	59	
Central of Georgia Railroad Company.....	---	5	---	1	---	3	---	---	1	---	17	1	29	2	4	---	36	3	---	96	---	
Cinn., N.O. & Texas Pacific Rwy.....	---	---	---	---	---	---	---	---	---	---	7	2	5	5	4	---	9	7	---	25	---	
Clinchfield Railroad.....	---	2	---	5	---	2	---	---	---	---	2	1	8	---	1	---	5	1	56	25	14.01	
Florida East Coast Railway.....	---	1	---	1	---	---	---	---	1	---	4	5	39	4	4	---	6	9	4.06	56	25.28	
Georgia Railroad.....	---	3	---	3	---	3	---	---	3	---	13	2	14	1	---	---	8	3	4.63	47	72.53	
Georgia Southern & Florida Railway.....	---	---	---	---	---	---	---	---	---	---	5	4	7	---	---	---	10	4	---	22	---	
Illinois Central Gulf Railroad.....	2	40	---	49	---	11	---	21	1	27	85	32	220	16	27	1	167	52	1.39	647	17.26	
Louisville and Nashville Railroad.....	---	19	---	40	---	8	---	3	14	1	120	46	115	18	31	2	159	67	2.02	509	15.31	
Norfolk Southern Railway.....	---	3	---	---	---	---	---	---	---	---	9	---	11	---	---	---	5	---	---	29	---	
Seaboard Coast Line Railroad.....	---	46	---	39	---	8	---	2	1	10	2	142	79	328	35	20	3	167	120	3.03	760	19.17
Southern Railway.....	---	12	---	3	---	6	---	---	1	---	86	39	211	28	50	1	168	68	1.69	537	13.31	
SUBTOTAL, SOUTHERN DISTRICT:..	2	130	---	141	---	41	---	26	2	57	3	495	215	1,033	111	142	7	841	340	2.17	2,906	18.55
WESTERN DISTRICT																						
Atchison, Topeka and Santa Fe Railway..	---	38	---	33	---	16	---	6	1	11	2	110	56	241	27	26	2	116	88	1.45	597	9.81
Burlington Northern.....	---	40	---	76	---	27	---	21	---	22	4	224	71	147	18	35	---	315	93	1.07	907	10.41
Chicago and Northwestern.....	---	12	---	13	---	10	---	5	---	5	---	36	27	128	6	14	1	98	34	1.20	321	11.35
Chi., Milv., St. Paul & Pacific Railroad.....	---	18	---	7	---	9	---	---	---	9	1	73	18	114	3	6	3	143	25	1.09	379	16.55
Chicago, Rock Island & Pacific Railroad.....	---	14	---	21	---	4	---	1	---	3	---	49	11	109	3	11	---	96	14	83	308	18.30
Colorado and Southern Railway.....	---	2	---	1	---	2	---	---	---	---	6	1	6	---	---	---	8	1	90	25	22.56	
Denver and Rio Grande Western Railroad..	---	3	---	5	---	6	---	2	---	1	---	11	4	11	2	1	25	7	96	65	8.89	
Duluth, Missabe and Iron Range Railway..	---	1	---	---	---	---	---	---	---	---	2	1	1	---	---	---	5	1	39	10	3.89	
Duluth, Winnipeg and Pacific Railway.....	---	1	---	1	---	---	---	---	---	---	2	---	3	---	---	---	2	---	9	11.69		
Fort Worth and Denver Railway.....	---	1	---	---	---	2	---	---	---	1	8	3	3	---	---	---	11	4	1.85	31	14.33	
Kansas City Southern Railway.....	---	3	---	4	---	4	---	---	---	---	21	9	42	3	1	---	36	12	1.98	111	18.28	
Missouri-Kansas-Texas Railroad.....	---	---	---	12	---	2	---	---	2	---	8	13	63	8	2	---	58	23	4.36	147	28.01	
Missouri Pacific Railroad.....	---	35	---	52	---	13	---	1	---	---	8	57	439	17	48	1	189	76	1.93	872	22.16	
Northwestern Pacific Railroad.....	---	1	---	---	---	---	---	---	---	---	2	---	2	---	---	---	2	---	7	9.04	---	
St. Louis-San Francisco Railway.....	1	12	---	45	---	8	---	3	---	4	2	27	14	90	5	10	1	42	23	1.50	241	15.71
St. Louis Southwestern Railway Company..	---	5	---	21	---	3	---	5	---	2	29	8	37	2	3	---	50	10	1.29	155	20.01	
Soo Line.....	---	18	---	6	---	3	---	1	1	---	2	---	16	75	---	4	1	70	18	1.98	219	24.06
Southern Pacific Trans. Company.....	---	53	---	110	---	36	---	12	---	18	8	198	33	227	44	52	2	808	87	1.32	1,110	16.92
Texas Mexican Railway Company.....	---	1	---	---	---	---	---	---	---	---	7	---	1	---	---	---	16	1	1.81	30	54.45	
Toledo, Peoria and Western Railroad.....	---	---	---	---	---	---	---	---	---	---	3	---	8	---	2	---	3	---	---	17	17.53	
Union Pacific Railroad.....	1	53	---	34	---	16	---	5	1	18	2	202	40	164	22	20	4	249	70	1.46	761	15.86
Western Pacific.....	---	5	---	1	---	---	---	---	1	---	19	5	22	1	---	---	40	6	1.25	88	18.26	
SUBTOTAL, WESTERN DISTRICT:..	2	316	---	442	---	162	---	63	3	106	20	1,164	387	1,938	162	241	16	1,982	593	1.37	6,414	14.79
CLASS I RR (SWITCHING AND TERMINAL)																						
EASTERN DISTRICT																						
Albion and Southern Railroad.....	---	---	---	3	---	---	---	---	---	---	2	---	---	---	---	---	11	---	---	16	16.95	
Alton and Southern Railroad.....	---	3	---	2	---	---	---	---	---	---	---	---	3	---	1	---	2	---	---	13	12.07	
Balt. and Ohio Chicago Term. Railroad..	---	8	---	1	---	---	---	---	1	---	5	1	6	---	---	---	7	1	54	30	16.27	
Belt Railway Company of Chicago.....	---	4	---	---	---	1	---	---	---	---	8	---	3	---	---	---	4	---	22	11.58	---	
Chicago, Union Station.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---	---	1	1.52	
Chicago, Union Station.....	---	---	---	2	---	1	---	---	1	---	1	---	---	---	---	---	1	---	---	8	10.10	
Coneaugh and Black Lick Railroad.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	6	10.79	
Cuyahoga Valley Railway Company.....	---	1	---	3	---	1	---	---	6	---	7	2	2	1	---	---	10	5	1.34	30	8.06	
Indiana Harbor Belt Railroad.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	3	---	4	78.83	---	
Lakefront Dock and Railroad Terminal... Lake Terminal Railroad Company.....	---	1	---	1	---	---	---	---	---	---	2	---	3	---	---	---	10	---	---	23	34.28	
Monongahela Connecting Railroad.....	---	---	---	---	---	---	---	---	---	---	3	---	2	---	---	---	4	---	---	9	11.45	
Pataasco and Back Rivers Railroad.....	---	1	---	---	---	1	---	---	---	---	6	---	1	---	1	1	8	1	96	18	17.34	
Phila., Bethlehem and New Eng. Railroad.....	---	---	---	---	---	---	---	---	1	---	---	---	---	---	---	---	---	---	---	7	8.12	
South Buffalo Railway.....	---	2	---	3																		

(CONT.)

TABLE 204 CASUALTIES IN TRAIN INCIDENTS BY CAUSE
CLASS I AND CLASS II RAILROADS, 1977

	Coupling		Operating Locos/Str Cms		Operating Hand Brakes		Operating Switches		Contact With Fixed Structure		Get On Off		Acc At Pub Klngs		Struck Or Run Over		...Other...		-----TOTAL-----				
	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Inj	Kill	Non Hrs	Inj	Non Hrs	
SOUTHERN DISTRICT (CONT.)																							
SUBTOTAL, SOUTHERN DISTRICT:- WESTERN DISTRICT	---	1	---	2	---	---	---	---	---	1	---	3	---	2	---	---	---	3	---	---	12	8.00	
Houston Belt and Terminal Railway.....	---	5	---	1	---	1	---	---	---	---	---	5	---	16	---	2	1	---	12	2	.99	41	20.28
Kansas City Terminal Railway.....	---	---	---	1	---	---	---	---	---	---	---	1	---	---	---	---	---	---	---	---	2	3.31	
Port Terminal RR Assoc.....	---	4	---	5	---	1	---	---	---	---	---	5	1	1	---	2	---	12	1	1.03	30	31.02	
Terminal Railroad Association of St. Louis.....	---	9	---	1	---	---	---	---	1	---	4	---	12	1	5	---	---	---	7	1	.34	39	13.11
Texas Pacific-Missouri Pacific Terminal Rail.....	---	1	---	1	---	---	---	---	---	---	---	2	---	---	---	---	---	---	4	---	8	8.72	
SUBTOTAL, WESTERN DISTRICT:- CLASS II RAILROADS	---	19	---	9	---	2	---	---	1	---	4	---	25	2	22	2	3	---	35	4	.53	120	16.03
SUBTOTAL, CLASS II:-	3	56	---	52	---	15	---	3	---	23	1	118	31	173	8	19	---	183	43	1.20	604	17.97	
RECAPITULATION ALL DISTRICTS																							
CLASS I RR (Line-Haul).....	6	654	---	903	3	290	---	103	6	242	29	2,260	815	4,063	397	594	30	4,755	1,286	1.30	13,864	14.02	
CLASS I RR (Switching and Terminal)....	---	44	---	40	---	6	---	2	---	18	---	79	5	44	3	10	3	125	11	.39	368	12.93	
CLASS II Railroads.....	3	56	---	52	---	15	---	3	---	23	1	118	31	173	8	19	---	183	43	1.20	604	17.97	
TOTAL FOR ALL RAILROADS.....	9	756	---	995	3	311	---	108	6	283	30	2,457	851	4,280	408	623	33	5,063	1,340	1.27	14,876	14.13	

‡ Included in Antrak
 * Included in Southern Railway System

NOTE: Injury columns include nonfatal illnesses

TABLE 205-A CASUALTIES IN RAILROAD INCIDENTS,
CLASS I AND CLASS II RAILROADS, 1977

	Coupling		Locos/Mtr Crs		Operating Hand Brakes		Operating Switches		Contact with Fixed Structures		Getting on or off car or Loco		Acc At Pub Kings		Struck or Run Over		Other.....		Totals		Per mil	
	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Man Hours	Injured	Man Hours	Illness	Man Hours
CLASS I RR (LINE-HAUL)																						
EASTERN DISTRICT																						
Antrak.....	5	2	1	5	1	20	43	2	4	2	1	552	1	581	15.65	10	0.30					
Antrak - Northeast Corridor.....	6	2	1	5	1	2	43	1	4	2	1	1,937	1	1,998	36.42	159	1.73					
Baltimore and Ohio Railroad.....	46	7	23	64	1	89	156	4	902	60	171	2	0.32	220	35.43	9	1.45					
Bangor and Aroostook Railroad.....	2	3	2	2	1	4	33	21	33	21	24	30.69	5	3.72								
Bessemer and Lake Erie Railroad.....	1	4	4	11	1	4	171	62.91	6	2.21												
Boston and Maine Corporation.....	11	2	2	13	5	21	171	2	0.32	220	35.43	9	1.45									
Canadian Pacific Railway Company.....	2	1	1	5	1	1	33	40	74.49	2	3.72											
Central Vermont.....	2	1	1	5	1	1	21	24	30.69	5	3.72											
Chesapeake and Ohio Railway Company.....	86	24	39	84	1	136	1	2	1	4	978	5	0.14	1,351	37.19	32	0.68					
Chicago and Illinois Midland Railroad.....	2	2	1	2	2	2	86	95	137.48	11	0.06	9,427	50.44	449	2.40							
Consolidated Rail Corp.....	223	87	71	290	5	344	2	18	9	8,394	11	0.06	9,427	50.44	449	2.40						
Delaware and Hudson Railroad.....	4	1	3	5	13	13	61	87	20.91	2	0.48											
Detroit and Toledo Shore Line Railroad.....	3	1	2	1	4	4	82	93	172.86	1	1.86											
Detroit, Toledo and Ironton Railroad.....	24	3	2	12	11	147	199	70.17	1	0.18												
Elgin, Joliet and Eastern Railway.....	10	3	7	19	13	270	324	57.87	1	0.74												
Grand Trunk Western.....	27	3	8	26	28	308	402	42.68	7	0.74												
Illinois Terminal Railroad.....	3	5	1	5	3	54	68	56.11	2	1.65												
Long Island Railroad.....	7	2	6	14	2	1	635	764	64.18	54	4.54											
Maine Central Railroad.....	3	6	7	7	9	152	99.21	5	1.95													
Missouri-Illinois Railroad Co.....	83	31	49	97	3	131	13	1	1,992	1	0.02	2,400	51.19	34	0.73							
Norfolk and Western Railway.....	1	1	1	8	13	13	315	339	76.18	4	0.92											
Pittsburg and Lake Erie Railroad.....	12	7	2	5	16	126	168	89.51	1	0.92												
Richmond Fredericksburg Potomac RR.....	8	4	3	7	9	91	1	0.43	122	52.25	10	4.28										
Western Maryland Railway.....	592	191	232	682	12	1,008	3	43	2	5	17	17,492	23	0.06	20,257	50.84	843	2.12				
SOUTHERN DISTRICT																						
Alabama Great Southern Railroad.....	1	3	3	1	11	38	45	2	3	2.35												
Autotrain Corporation.....	5	2	1	1	155	174	136.47	3	2.35													
Central of Georgia Railroad Company.....	7	4	6	6	3	45	69	3	3	1	1											
Cinn., N.O. & Texas Pacific Rwy.....	5	1	1	6	3	33	49	1	1	1												
Clinchfield Railroad.....	1	6	2	3	58	77	43.74	1	0.56													
Florida East Coast Railway.....	3	2	3	7	7	23	10.38	1	0.56													
Georgia Railroad.....	4	3	7	6	3	35	59	91.05	1	0.56												
Georgia Southern & Florida Railroad.....	2	1	3	3	2	19	27	3	3	1												
Illinois Central Gulf Railroad.....	79	29	18	95	7	127	4	2	3	2,292	3	0.08	2,653	70.77	75	2.00						
Louisville and Nashville Railroad.....	98	17	38	75	1	89	1,636	49.21	40	1.20												
Norfolk Southern Railway.....	5	2	2	4	15	15	26	3	3	1												
Seaboard Coast Line Railroad.....	105	14	25	77	2	63	1	4	3	8	1,429	9	0.23	1,422	35.88	30	0.76					
Southern Railway.....	45	3	29	65	45	45	2	3	882	3	0.67	1,871	26.55	14	0.35							
SUBTOTAL, SOUTHERN DISTRICT.....	360	73	132	344	10	357	1	13	8	15	6,034	16	0.10	7,331	46.81	175	1.12					
WESTERN DISTRICT																						
Atchison, Topeka and Santa Fe Railroad.....	51	26	39	56	1	86	1	8	5	1,187	7	0.12	1,457	23.95	17	0.28						
Burlington Northern.....	145	59	65	235	4	228	2	2	3	4,106	3	0.03	4,845	55.59	218	2.50						
Chicago and Northwestern.....	53	20	28	69	1	71	1	9	1	1,059	1	0.04	1,309	46.28	14	0.50						
Chi., Milw., St. Paul & Pacific Railroad.....	70	12	12	63	3	62	5	5	873	1,100	48.02	12	0.52									
Chicago, Rock Island & Pacific Railroad.....	28	6	9	41	3	37	7	7	658	2	784	46.59	17	1.13								
Colorado and Southern Railway.....	4	1	1	7	7	7	47	66	59.57	1	0.90											
Denver and Rio Grande Western Railroad.....	3	2	6	7	8	1	143	1	0.14	169	23.12	11	1.50									
Duluth, Missabe and Iron Range Railroad.....	4	2	2	2	8	111	127	49.45	2	0.78												
Duluth, Winnipeg and Pacific Railroad.....	2	1	1	1	1	18	21	27.27	---	---												
Fort Worth and Denver Railway.....	6	2	7	8	15	2	112	2	0.46	132	61.03	2	1.39									
Kansas City Southern Railway.....	15	9	7	11	8	108	219	35.90	3	0.49												
Missouri-Kansas-Texas Railroad.....	70	24	26	65	1	105	1	10	4	1,117	6	0.15	1,422	36.14	43	1.09						
Missouri Pacific Railroad.....	1	1	2	2	34	34	38	49.10	1	1.29												
St. Louis-San Francisco Railway.....	18	12	15	23	20	1	657	2	0.13	746	48.62	13	0.85									
Northwestern Pacific Railroad.....	22	3	9	16	40	324	416	53.71	17	2.19												
St. Louis Southwestern Railway Company.....	28	13	13	27	36	1	8	1	390	2	0.22	516	56.68	26	2.86							
Soo Line.....	109	27	78	128	1	148	2	13	3	5	2,450	8	0.12	2,957	44.91	106	1.61					
Texas Mexican Railway Company.....	2	2	4	5	5	51	64	116.15	---	---												
Toledo, Peoria and Western Railroad.....	2	2	1	1	5	51	52.58	3	3.09													
Union Pacific Railroad.....	73	9	29	77	3	108	6	6	4	1,844	4	0.08	2,149	46.78	16	0.33						
Western Pacific.....	18	1	9	7	6	223	46.28	6	1.25													

(CONT.)

TABLE 205-A CASUALTIES IN NONTRAIN INCIDENTS,
CLASS I AND CLASS II RAILROADS, 1977

	...Coupling...		Operating		Operating		Operating		Contact with		Getting on or		Acc At		Struck or		Other.....		Totals					
	Killed	Injured	Locos/Mtr Cts	Killed Injured	Hand Brakes	Killed Injured	Switches	Killed Injured	Fixed Structures	Killed Injured	off car or Loco	Killed Injured	Pub Xings	Killed Injured	Run Over	Killed Injured	Killed Injured	Killed Injured	Per Mil Killed	Per Mil Man Hours	Injured	Per Mil Man Hours	Illness	Per Mil Man Hours
WESTERN DISTRICT (CONT.)																								
SUBTOTAL, WESTERN DISTRICT:.....	---	724	---	230	---	356	---	848	1	23	1	1,013	6	71	1	11	26	15,753	35	0.08	19,029	43.87	535	1.23
CLASS I RR (SWITCHING AND TERMINAL)																								
EASTERN DISTRICT																								
Albiquippa and Southern Railroad...	---	---	---	1	---	1	---	2	---	---	---	---	---	---	---	---	59	---	---	63	66.74	1	1.06	
Alton and Southern Railroad.....	---	3	---	2	---	1	---	5	---	---	---	7	---	---	---	---	25	---	---	43	39.93	---	---	
Balt. and Ohio Chicago Term. Railroad.....	---	6	---	---	---	3	---	5	---	1	---	6	---	---	---	---	64	---	---	85	46.10	1	0.54	
Belt Railway Company of Chicago...	---	8	---	---	---	---	---	2	---	---	---	5	---	---	---	---	67	---	---	82	43.16	1	0.53	
Chicago, Union Station.....	---	---	---	---	---	---	---	1	---	---	---	---	---	---	---	---	26	---	---	27	41.70	---	---	
Coneaugh and Black Lick Railroad...	---	---	---	1	---	---	---	3	---	---	---	4	---	---	---	---	22	---	---	30	37.88	2	2.53	
Cuyahoga Valley Railway Company...	---	4	---	1	---	---	---	5	---	---	---	2	---	---	---	---	18	---	---	30	53.96	1	1.80	
Indiana Harbor Belt Railroad.....	---	6	---	6	---	3	---	7	---	---	---	21	---	1	---	5	106	---	---	155	41.66	4	1.07	
Lakefront Dock and Railroad Terminal.....	---	---	---	---	---	---	---	---	---	---	---	1	---	---	---	---	---	---	---	1	19.61	---	---	
Lake Terminal Railroad Company....	---	6	---	2	---	1	---	8	---	---	---	1	---	---	---	---	44	---	---	62	92.40	---	---	
Monongahela Connecting Railroad...	---	---	---	---	---	---	---	3	---	---	---	3	---	---	---	---	53	---	---	59	75.06	---	---	
Patapsco and Back Rivers Railroad...	---	4	---	---	---	---	---	6	---	---	---	3	---	---	---	---	41	---	---	54	52.02	---	---	
Phila., Bethlehem and New Eng. Railroad.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	12	---	---	12	13.92	2	2.32	
South Buffalo Railway.....	---	5	---	2	---	---	---	6	---	---	---	3	---	---	---	---	34	---	---	50	41.43	---	---	
Union Railroad (Penn.).....	---	1	---	---	---	6	---	11	---	---	---	6	---	---	---	---	117	---	---	141	41.84	4	1.19	
SUBTOTAL, EASTERN DISTRICT:.....	---	43	---	14	---	16	---	64	---	1	---	62	---	1	---	5	688	---	---	894	45.90	16	0.82	
SOUTHERN DISTRICT																								
Birmingham Southern Railroad.....	---	3	---	1	---	---	---	---	---	---	---	---	---	---	---	---	32	---	---	36	64.86	---	---	
Kentucky and Indiana Terminal Railroad.....	---	6	---	3	---	1	---	4	---	---	---	4	---	---	---	---	30	---	---	48	50.79	2	2.12	
SUBTOTAL, SOUTHERN DISTRICT:.....	---	9	---	4	---	1	---	4	---	---	---	4	---	---	---	---	62	---	---	84	56.00	2	1.33	
WESTERN DISTRICT																								
Houston Belt and Terminal Railway...	---	4	---	1	---	---	---	7	---	---	---	4	---	---	---	---	34	---	---	50	24.73	1	0.49	
Kansas City Terminal Railway.....	---	---	---	---	---	---	---	1	---	---	---	1	---	1	---	---	13	---	---	16	26.45	---	---	
Port Terminal RR Assoc.....	---	9	---	3	---	2	---	9	---	---	---	3	---	---	---	---	1	56	1	1.03	82	84.80	8	8.27
Terminal Railroad Association of St. Louis.....	---	16	---	2	---	1	---	17	---	1	---	17	---	---	---	---	102	---	---	156	52.45	---	---	
Texas Pacific-Missouri Pacific Terminal Rail.....	---	3	---	---	---	1	---	5	---	---	---	4	---	---	---	---	19	---	---	32	34.90	---	---	
SUBTOTAL, WESTERN DISTRICT:.....	---	32	---	6	---	4	---	39	---	1	---	29	---	1	---	---	1	224	1	0.13	336	44.89	9	1.20
CLASS II RAILROADS																								
SUBTOTAL, CLASS II:.....	---	165	---	69	---	46	---	123	---	8	---	165	---	---	2	3	1,895	3	0.08	2,473	69.01	26	0.73	
RECAPITULATION ALL DISTRICTS																								
Class I RR (Line-Haul).....	---	1,676	---	494	---	720	---	1,874	1	45	2	2,378	10	127	3	24	62	39,279	78	0.07	46,617	47.14	1,549	1.57
Class I RR (Switching and Terminal).....	---	84	---	24	---	21	---	107	---	2	---	95	---	2	---	5	1	974	1	0.04	1,314	46.17	27	0.95
Class II Railroads.....	---	165	---	69	---	46	---	123	---	8	---	165	---	---	2	3	1,895	3	0.08	2,473	69.01	26	0.73	
TOTAL FOR ALL RAILROADS.....	---	1,925	---	587	---	787	---	2,104	1	55	2	2,638	10	129	3	31	66	42,148	82	0.07	50,404	47.86	1,602	1.52

** Included in Amtrak
* Included in Southern Railway System

TABLE 205-B CASUALTIES IN NONTRAIN RAPID TRANSIT INCIDENTS IN 1977

	...Coupling...		Operating		Operating		Contact with		Getting on or		Acc At		Struck or		...Other...		-----Totals-----							
	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Man	Hours	Injured	Man	Hours	Illness	Man
Bay Area Rapid Transit (BART).....	---	2	---	---	---	---	2	---	---	---	39	---	---	---	---	424	---	---	467	124.73	12	3.21		
Chicago Transit Authority.....	---	6	---	14	---	---	1	---	---	---	39	---	---	---	---	4	609	4	0.55	669	92.07	2	0.28	
Cleveland Transit System.....	---	---	---	3	---	---	---	---	---	---	3	---	---	---	---	23	---	---	29	41.91	---	---		
Mass. Bay Transportation Authority.....	---	1	---	1	---	1	---	6	---	---	38	---	---	---	---	318	---	---	365	100.66	---	---		
New York City Trans. Authority (MTA).....	---	---	---	---	---	---	---	---	---	---	46	---	---	---	---	10	3,993	10	0.17	4,039	69.24	27	0.46	
Port Authority Trans-Hudson.....	---	1	---	2	---	---	---	---	---	---	16	---	---	---	---	172	---	---	191	89.21	---	---		
Port Auth. Trans. (PATCO).....	---	---	---	1	---	---	---	---	---	---	5	---	---	---	---	74	---	---	80	129.66	---	---		
Staten Island Rapid Transit Oper. Auth.....	---	---	---	---	---	1	---	---	---	---	1	---	---	---	---	14	---	---	16	32.13	---	---		
Southeastern Pa. Trans. Authority.....	---	---	---	6	---	---	1	---	1	---	13	---	---	---	---	1	323	1	0.34	344	117.37	---	---	
Washington Metro Transit Authority.....	---	1	---	4	---	3	---	2	---	---	13	---	---	---	---	313	---	---	336	219.90	2	1.31		
Total.....	---	11	---	31	---	5	---	12	---	1	213	---	---	---	---	15	6,263	15	0.09	6,536	40.16	43	0.26	

NOTE: Nonfatal illnesses are not included in the injury data

[illegible]

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(CONT.)

TABLE 206-A FATALITIES IN TRAIN ACCIDENTS, TRAIN INCIDENTS, AND NONTRAIN INCIDENTS
BY CLASS I AND CLASS II RAILROADS IN 1977

	Train Accidents						Train Incidents						Nontrain Incidents						Total						
	Empl on Duty	Empl Not on Duty	Pass- engers	Non Tres- passers	Tres- passers	Total	Empl on Duty	Empl Not on Duty	Pass- engers	Non Tres- passers	Tres- passers	Total	Empl on Duty	Empl Not on Duty	Pass- engers	Non Tres- passers	Tres- passers	Total	Empl on Duty	Empl Not on Duty	Pass- engers	Non Tres- passers	Tres- passers	Total	
EASTERN DISTRICT (CONT.)																									
Phila., Bethlehem and New Eng. Railroad....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
South Buffalo Railway.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
Union Railroad (Penna.).....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
SUBTOTAL, EASTERN DISTRICT.....	---	---	---	---	---	---	2	---	---	---	5	7	---	---	---	---	---	---	---	2	---	---	---	5	7
SOUTHERN DISTRICT																									
Birmingham Southern Railroad.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
Kentucky and Indiana Terminal Railroad.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
SUBTOTAL, SOUTHERN DISTRICT.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
WESTERN DISTRICT																									
Houston Belt and Terminal Railway.....	---	---	---	---	---	---	---	---	---	---	2	2	---	---	---	---	---	---	---	---	---	---	---	2	2
Kansas City Terminal Railway.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
Port Terminal RR Assoc.....	---	---	---	---	---	---	---	---	---	---	1	---	---	---	---	---	---	1	1	---	---	---	1	1	2
Terminal Railroad Association of St. Louis	---	---	---	---	---	---	---	---	---	---	1	---	---	---	---	---	---	---	1	---	---	---	1	---	1
Texas Pacific-Missouri Pacific Terminal	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
Rail.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
SUBTOTAL, WESTERN DISTRICT.....	---	---	---	---	---	---	---	---	---	---	2	2	4	---	---	---	---	1	1	---	---	---	2	3	5
CLASS II RAILROADS																									
SUBTOTAL, CLASS II:.....	2	---	---	2	---	4	4	---	1	28	10	43	2	---	---	1	---	3	8	---	1	31	10	50	
RECAPITULATION																									
ALL DISTRICTS																									
Class I RR (Line-Haul).....	17	---	---	81	6	104	59	---	3	817	407	1,286	28	2	---	21	27	78	104	2	---	3	919	440	1,468
Class I RR (Switching and Terminal).....	---	---	---	---	---	---	2	---	---	7	11	---	---	---	---	1	1	2	---	---	---	2	8	12	
Class II Railroads.....	2	---	---	2	---	4	4	---	1	28	10	43	2	---	---	1	---	3	8	---	1	31	10	50	
TOTAL FOR ALL RAILROADS.....	19	---	---	83	6	108	65	---	4	847	424	1,340	30	2	---	22	28	82	114	2	---	4	952	458	1,530

TABLE 206-B FATALITIES IN TRAIN ACCIDENTS, TRAIN INCIDENTS, AND NONTRAIN INCIDENTS
FOR RAPID TRANSIT CARRIERS IN 1977

	Train Accidents-----						Train Incidents-----						Nontrain Incidents-----						Total-----						
	Empl	Empl		Non			Empl	Empl		Non			Empl	Empl		Non			Empl	Empl		Non			
	on	Not on	Pass-	Tres-	Tres-	Total	on	Not on	Pass-	Tres-	Tres-	Total	on	Not on	Pass-	Tres-	Tres-	Total	on	Not on	Pass-	Tres-	Tres-	Total	
	Duty	Duty	engers	passers	passers		Duty	Duty	engers	passers	passers		Duty	Duty	engers	passers	passers		Duty	Duty	engers	passers	passers		
Bay Area Rapid Transit (BART).....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
Chicago Transit Authority.....	---	---	11	---	---	11	1	---	2	---	2	5	---	---	---	2	2	4	1	---	---	13	2	4	20
Cleveland Transit System.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
Mass. Bay Transportation Authority.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
New York City Trans. Authority (MTA).....	---	---	---	---	---	---	1	---	4	2	23	30	1	---	---	7	2	10	2	---	---	4	9	25	40
Port Authority Trans-Hudson.....	1	---	---	---	---	1	---	---	---	---	2	2	---	---	---	---	---	---	1	---	---	---	---	2	3
Port Autho. Trans. (PATCO) Lindenwood Ln.....	---	---	---	---	---	---	---	---	---	---	1	1	---	---	---	---	---	---	---	---	---	---	---	1	1
Staten Island Rapid Transit Oper. Auth.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
Southeastern Pa. Trans. Authority.....	---	---	---	---	---	---	---	---	---	---	5	5	---	---	---	1	---	1	---	---	---	1	5	6	
Washington Metro Transit Authority.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	
Total.....	1	---	11	---	---	12	2	---	6	2	33	43	1	---	---	10	4	15	4	---	---	17	12	37	70

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	Train Accidents.....						Train Incidents.....						Nontrain Incidents.....						Total.....							
	Empl on Duty	Empl Not on Duty	Pass- engers	Non Tres- passers	Tres- passers	Total	Empl on Duty	Empl Not on Duty	Pass- engers	Non Tres- passers	Tres- passers	Total	Empl on Duty	Empl Not on Duty	Pass- engers	Non Tres- passers	Tres- passers	Total	Empl on Duty	Empl Not on Duty	Pass- engers	Non Tres- passers	Tres- passers	Total		
CLASS I RR (LINE-HAUL)																										
EASTERN DISTRICT																										
Astrak.....	35	---	---	23	2	1	61	201	---	12	15	---	228	581	---	9	2	---	592	817	---	44	19	---	881	
Astrak - Northeast Corridor.....	---	---	---	1	---	---	1	49	---	45	6	12	112	2,049	11	37	51	8	2,156	2,098	11	83	57	20	2,269	
Baltimore and Ohio Railroad.....	30	---	---	---	6	---	36	266	1	2	162	12	443	1,177	22	3	---	---	1,211	1,473	23	5	177	12	1,690	
Bangor and Aroostook Railroad.....	---	---	---	---	---	---	---	---	---	---	2	7	---	---	---	---	---	---	73	76	---	---	---	---	80	
Bosener and Lake Erie Railroad.....	---	---	---	---	---	---	---	25	---	---	---	---	26	173	2	---	---	1	177	198	2	2	---	1	203	
Boston and Maine Corporation.....	3	---	---	---	---	---	3	34	---	9	22	4	69	215	2	10	2	---	229	252	2	19	24	4	307	
Canadian Pacific Railway Company.....	---	---	---	---	---	---	---	5	---	---	1	---	6	42	---	---	---	---	42	47	---	---	1	---	48	
Central Vermont.....	---	---	---	---	---	---	---	2	---	---	4	---	1	24	---	---	---	---	24	26	---	---	4	1	31	
Chesapeake and Ohio Railway Company.....	15	---	---	4	1	---	20	249	---	2	178	19	404	1,344	29	3	6	1	1,383	1,408	29	9	181	20	1,847	
Chicago and Illinois Midland Railway.....	---	---	---	---	---	---	---	7	---	---	---	---	8	93	---	---	---	---	95	100	---	---	7	---	103	
Consolidated Rail Corp.....	81	---	---	30	9	2	122	1,374	4	23	309	90	1,800	9,668	109	24	61	14	9,876	11,123	113	77	379	106	11,798	
Delaware and Hudson Railroad.....	---	---	---	---	---	---	---	35	1	---	---	---	37	87	2	---	---	---	89	122	3	---	---	---	126	
Detroit and Toledo Shore Line Railroad.....	4	---	---	---	1	---	5	13	---	6	---	---	19	93	---	---	---	---	96	110	1	---	---	---	118	
Detroit, Toledo and Ironton Railroad.....	---	---	---	---	---	---	---	24	---	---	---	---	40	198	---	---	---	---	199	236	---	---	---	---	239	
Edin, Joliet and Eastern Railway.....	8	---	---	---	---	---	8	95	---	---	---	---	113	314	8	---	---	1	2	325	417	8	---	15	6	446
Grand Trunk Western.....	16	---	---	2	1	1	20	118	---	2	55	9	184	402	---	1	6	---	409	536	---	5	62	10	613	
Illinois Terminal Railroad.....	---	---	---	---	---	---	---	19	---	---	---	---	24	67	1	---	---	2	70	86	1	---	---	---	94	
Long Island Railroad.....	2	---	---	---	---	---	2	109	---	26	6	6	147	738	13	35	25	7	818	849	13	61	31	13	967	
Maine Central Railroad.....	2	---	---	---	---	---	2	41	---	---	---	---	50	154	2	---	---	---	157	2	---	---	7	3	209	
Missouri-Illinois Railroad Co.....	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	3	3	---	---	---	---	3	
Norfolk and Western Railway.....	18	---	---	---	8	3	29	418	1	1	241	30	691	2,279	43	2	107	3	2,434	2,715	44	3	356	36	3,154	
Pittsburg and Lake Erie Railroad.....	---	---	---	---	---	---	---	23	---	---	5	1	29	342	---	1	---	---	343	365	---	1	5	1	372	
Richmond Fredericksburg Potomac RR.....	---	---	---	---	---	---	---	27	---	---	6	4	---	37	164	---	2	1	1	168	191	---	8	5	1	205
Western Maryland Railway.....	3	---	---	---	---	---	3	15	---	---	8	---	23	128	2	---	---	1	132	146	---	---	9	1	158	
SUBTOTAL, EASTERN DISTRICT.....	217	---	60	28	7	312	3,154	7	128	1,062	193	4,544	20,406	249	127	278	39	21,099	23,777	256	315	1,368	239	25,955		
SOUTHERN DISTRICT																										
Alabama Great Southern Railroad.....	---	---	---	---	---	---	---	18	---	---	45	---	63	46	---	10	---	---	47	64	---	1	45	---	110	
Autotrain Corporation.....	---	---	---	2	1	---	3	33	---	57	---	---	90	161	---	1	6	---	177	194	---	69	7	---	270	
Central of Georgia Railroad Company.....	1	---	---	---	3	---	4	64	---	28	3	---	36	69	1	---	2	---	72	134	1	---	34	3	172	
Cinn., W. O. & Texas Pacific Rwy.....	---	---	---	---	---	---	---	17	---	6	2	---	25	46	3	---	1	---	50	63	3	---	---	---	76	
Clinchfield Railroad.....	3	---	---	---	2	5	15	---	1	8	1	25	78	---	---	---	---	---	78	96	---	1	8	2	108	
Florida East Coast Railway.....	---	---	---	---	---	---	---	7	---	---	---	---	28	21	56	23	---	---	23	30	---	---	28	21	79	
Georgia Railroad.....	2	---	---	---	---	---	2	33	---	14	---	---	47	56	2	---	1	---	59	91	2	---	15	---	108	
Georgia Southern & Florida Railway.....	2	---	---	---	---	---	2	15	---	7	---	---	22	28	---	---	---	30	45	2	---	---	---	---	54	
Illinois Central Gulf Railroad.....	35	---	---	---	22	1	58	394	1	6	229	17	647	2,630	21	22	53	2	2,728	3,059	22	28	304	20	3,433	
Louisville and Nashville Railroad.....	---	---	---	---	16	1	48	371	1	1	106	31	509	1,658	14	1	3	---	1,676	2,060	14	2	125	32	2,233	
Norfolk Southern Railway.....	---	---	---	---	---	---	---	17	---	---	12	---	29	29	---	---	---	---	29	46	---	---	12	---	58	
Seaboard Coast Line Railroad.....	52	---	---	---	19	---	71	407	1	2	324	26	760	1,435	8	1	8	---	1,452	1,894	9	3	351	26	2,283	
Southern Railway.....	142	---	7	9	---	---	156	278	---	26	233	26	531	1,039	22	9	28	---	1,081	1,318	29	9	265	20	1,655	
SUBTOTAL, SOUTHERN DISTRICT.....	228	7	11	70	4	240	1,669	2	67	1,041	127	2,906	7,298	73	35	98	2	7,506	9,115	82	113	1,209	133	10,652		
WESTERN DISTRICT																										
Atchison, Topeka and Santa Fe Railway.....	31	---	---	---	4	---	35	328	1	---	250	18	597	1,423	33	---	15	3	1,474	1,782	34	---	269	21	2,405	
Burlington Northern.....	60	---	1	9	2	---	71	715	3	1	153	32	907	4,998	31	6	34	---	5,063	5,774	11	19	41	6	6,012	
Chicago and Northwestern.....	25	---	---	---	---	---	25	174	---	8	---	---	321	1,275	14	19	15	---	1,323	1,474	14	27	133	21	1,669	
Chi., Milw., St. Paul & Pacific Railroad.....	21	---	---	---	4	---	25	259	1	5	105	9	379	1,098	2	1	9	2	1,112	1,378	3	6	118	11	1,516	
Chicago, Rock Island & Pacific Railroad.....	13	---	1	4	---	---	18	179	---	9	94	26	308	791	1	4	4	1	801	983	1	14	102	27	1,427	
Colorado and Southern Railway.....	---	---	---	---	---	---	---	20	---	---	5	---	25	67	---	---	---	---	67	87	---	---	5	---	92	
Denver and Rio Grande Western Railroad.....	1	---	---	---	---	---	1	50	---	2	12	1	65	177	2	---	---	---	180	228	2	2	13	1	339	
Duluth, Missabe and Iron Range Railway.....	---	---	---	---	---	---	---	6	---	---	3	---	10	109	2	---	18	---	129	115	2	---	21	1	139	
Duluth, Winnipeg and Pacific Railway.....	---	---	---	---	---	---	---	6	---	3	---	9	9	21	---	---	---	---	21	27	---	---	3	---	30	
Fort Worth and Denver Railway.....	3	---	---	---	2	---	5	23	---	7	1	31	130	---	---	---	3	1	134	156	---	---	12	2	170	
Kansas City Southern Railway.....	2	---	---	---	1	---	3	70	---	---	40	1	111	219	---	---	2	3	221	291	---	---	43	1	335	
Missouri-Kansas-Texas Railroad.....	4	---	---	---	---	---	4	80	---	---	65	2	107	200	---	---	---	---	542	784	---	---	85	5	374	
Missouri Pacific Railroad.....	18	---	---	---	3	---	21	393	1	1	457	20	872	1,439	11	---	12	3	1,465	1,850	12	1	472	23	2,358	
Northwestern Pacific Railroad.....	---	---	---	---	---	---	---	5	---	2	---	7	37	2	---	---	---	---	39	42	2	---	---	---	46	
St. Louis-San Francisco Railway.....	11	---	---	---	7	---	18	138	1	---	95	7	241	728	10	---	20	1	759	877	11	---	122	8	1,018	
St. Louis Southwestern Railway Company.....	5	---	---	---	2	1	8	116	---	---	35	4	155	425	5	---	2	1	433	546	5	---	39	6	596	
Soo Line.....	13	---	---	---	5	---	18	181	---	---	76	2	219	521	9	---	12	---	542	675	9	---	779	9	1,799	
Southern Pacific Transp. Company.....	61	---	3	13	1	---	78	817	---	3	219	75	1,114	3,007	29	1	19	7	3,063	3,885	29	7	251	83	4,255	
Texas Western Railway Company.....	---	---	---	---	---	---	---	25	---	---	4	1	30	64	---	---	---	---	64	89	---	---	4	1	94	
Toledo, Peoria and Western Railroad.....	1	---	---	---	---	---	---	7	---	---	10	---	17	54	---	---	---	---	54	62	---	---	10	---	72	
Union Pacific Railroad.....	25	---	---	---	10	1	36	574	2	1	172	12	761	2,095	52	---	15	3	2,165	2,694	54	1	197	16	2,962	
Western Pacific.....	9	---	---	---	7	---	16	67	---	---	---	---	88	227	2	---	---	---	89	303	2	---	26	2	333	
SUBTOTAL, WESTERN DISTRICT.....	303	---	5	71	5	384	4,193	9	33	1,944	235	6,414	19,055	245	31	196	32	19,561	23,551	254	69	2,213	272	26,359		
CLASS I RR (SWITCHING AND TERMINAL)																										
EASTERN DISTRICT																										
Allegipps and Southern Railroad.....	2	---	---	---	---	---	2	16	---	---	---	---	16	64	---	---	---	---	64	82	---	---	---	---	82	
Alton and Southern Railroad.....	1	---	---	---	---	---	1	10	---	1	2	---	13	43	---	---	---	---	43	54	---	---	1	2	57	
Balt. and Ohio Chicago Term. Railroad.....	---	---	---	---	---	---	---	22	---	---	4	8	30	86	---	---	---	---	86	108	---	---	4	---	116	
Belt Railway Company of Chicago.....	3	---	---	---	---	---	3	18	---	---	---	---	22	81	2	---	---	---	83	102	2	---	---	---	108	
Chicago and North Western.....	---	---	---	---	---	---	---	1	---	---	1	---	15	---	---	12	---	---	27	16	---	---	12	---	28	
Conemaugh and Black Lick Railroad.....	---	---	---	---	---	---	---	8	---	---	---	---	8	32	---	---	---	---	32	40	---	---	---	---	40	
Cuyahoga Valley Railway Company.....	---	---	---	---	---	---	---	5	---	---	1	6	31	---	---	---	---	---	31	36	---	---	---	1	37	
Indiana Harbor Belt Railroad.....	2	---	---	---	---	---	2	28	---	---	---	2	30	156												

(CONT.)

TABLE 206-C NON-FATAL CASUALTIES IN TRAIN ACCIDENTS, TRAIN INCIDENTS, AND NONTRAIN INCIDENTS
BY CLASS I AND CLASS II RAILROADS IN 1977

	Train Accidents.....						Train Incidents.....						Nontrain Incidents.....						Total.....					
	Empl on Duty	Empl Not on Duty	Pass- engers	Non Tres- passers	Tres- passers	Total	Empl on Duty	Empl Not on Duty	Pass- engers	Tres- passers	Tres- passers	Total	Empl on Duty	Empl Not on Duty	Pass- engers	Tres- passers	Tres- passers	Total	Empl on Duty	Empl Not on Duty	Pass- engers	Tres- passers	Tres- passers	Total
EASTERN DISTRICT (CONT.)																								
Phila., Bethlehem and New Eng. Railroad....	1	---	---	---	---	1	7	---	---	---	---	7	14	---	---	---	---	14	22	---	---	---	---	22
South Buffalo Railway.....	---	---	---	---	---	---	16	---	---	2	---	18	50	---	---	---	---	50	66	---	---	2	---	68
Union Railroad (Penn.).....	2	---	---	---	---	2	30	---	---	1	---	31	136	7	---	---	---	145	170	7	---	1	---	178
SUBTOTAL, EASTERN DISTRICT:.....	11	---	---	---	---	11	211	---	---	15	10	236	882	13	---	12	3	910	1,104	13	---	27	13	1,157
SOUTHERN DISTRICT																								
Birmingham Southern Railroad.....	2	---	---	---	---	2	4	---	---	1	---	5	36	---	---	---	---	36	42	---	---	1	---	43
Kentucky and Indiana Terminal Railroad.....	---	---	---	---	---	---	7	---	---	---	---	7	50	---	---	---	---	50	57	---	---	---	---	57
SUBTOTAL, SOUTHERN DISTRICT:.....	2	---	---	---	---	2	11	---	---	1	---	12	86	---	---	---	---	86	99	---	---	1	---	100
WESTERN DISTRICT																								
Houston Belt and Terminal Railway.....	---	---	---	---	---	---	24	---	---	15	2	41	49	1	---	---	1	51	73	1	---	15	3	92
Kansas City Terminal Railway.....	1	---	---	---	---	1	1	---	---	---	1	2	15	---	---	1	---	16	17	---	---	1	1	19
Port Terminal RR Assoc.....	---	---	---	1	---	1	28	---	---	2	---	30	90	---	---	---	---	90	118	---	---	3	---	121
Terminal Railroad Association of St. Louis.....	---	---	---	---	---	---	33	---	---	4	2	39	156	---	---	---	---	156	189	---	---	4	2	195
Texas Pacific-Missouri Pacific Terminal Rail.....	---	---	---	---	---	---	8	---	---	---	---	8	32	---	---	---	---	32	40	---	---	---	---	40
SUBTOTAL, WESTERN DISTRICT:.....	1	---	---	1	---	2	94	---	---	21	5	120	342	1	---	1	1	345	437	1	---	23	6	467
CLASS II RAILROADS																								
SUBTOTAL, CLASS II:.....	19	---	---	11	4	34	446	1	5	171	21	644	2,480	8	1	9	1	2,499	2,945	9	6	191	26	3,177
RECAPITULATION ALL DISTRICTS																								
Class I RR (Line-Haul).....	668	7	76	169	16	936	9,016	18	228	4,047	555	13,864	46,759	567	193	574	73	48,166	56,443	592	497	4,790	644	62,966
Class I RR (Switching and Terminal).....	14	---	---	1	---	15	316	---	---	---	15	368	1,310	14	---	13	4	1,341	1,640	14	---	51	19	1,724
Class II Railroads.....	19	---	---	11	4	34	446	1	5	171	21	644	2,480	8	1	9	1	2,499	2,945	9	6	191	26	3,177
TOTAL FOR ALL RAILROADS.....	701	7	76	181	20	985	9,778	19	233	4,255	591	14,876	50,549	589	194	596	78	52,006	61,028	615	503	5,032	669	67,867

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TABLE 206-D NON-FATAL CASUALTIES IN TRAIN ACCIDENTS, TRAIN INCIDENTS, AND NONTRAIN INCIDENTS
FOR RAPID TRANSIT CARRIERS IN 1977

	Train Accidents.....					Train Incidents.....					Nontrain Incidents.....					Total.....								
	Empl on Duty	Empl Not on Duty	Pass- engers	Non Tres- passers	Tres- passers	Total	Empl on Duty	Empl Not on Duty	Pass- engers	Non Tres- passers	Tres- passers	Total	Empl on Duty	Empl Not on Duty	Pass- engers	Non Tres- passers	Tres- passers	Total						
Bay Area Rapid Transit (BART).....	---	---	---	---	---	7	---	---	---	4	---	7	393	---	13	69	4	479	400	---	13	69	4	486
Chicago Transit Authority.....	7	---	201	---	---	208	86	---	68	4	4	162	457	---	56	158	---	671	550	---	325	162	4	1,041
Cleveland Transit System.....	3	---	1	---	---	4	7	---	8	1	---	16	11	---	8	10	---	29	21	---	17	11	---	49
Mass. Bay Transportation Authority.....	---	---	---	---	---	---	45	---	19	2	1	67	216	1	21	127	---	365	261	1	40	129	1	432
New York City Trans. Authority (MTA).....	7	---	---	---	---	7	109	---	356	31	27	523	2,306	---	291	1,275	194	4,066	2,422	---	647	1,306	221	4,596
Port Authority Trans-Hudson.....	---	---	---	---	---	---	15	1	12	1	1	30	117	1	10	63	---	191	132	2	22	64	1	221
Port Autho. Trans. (PATCO) Lindenwood Ln.....	---	---	---	---	---	---	1	---	10	---	---	11	30	---	9	41	---	80	31	---	19	41	---	91
Staten Island Rapid Transit Oper. Auth.....	---	---	---	---	---	---	7	---	15	2	3	7	16	---	---	---	---	16	23	---	---	---	---	23
Southeastern Pa. Trans. Authority.....	---	---	2	---	---	2	10	---	---	7	---	30	100	---	59	181	4	344	110	---	76	183	7	376
Washington Metro Transit Authority.....	6	---	---	3	---	9	12	---	---	7	---	19	221	---	4	111	2	339	239	---	4	121	2	366
Total.....	23	---	204	3	---	230	299	1	488	48	36	672	3,867	2	471	2,035	204	6,579	4,169	3	1,163	2,086	240	7,681

TABLE 207-A FATALITIES TO RAILROADS
CLASS I A

	I. Exec Office Staff			III. Maintenance of Way and Structures		
	Man Hrs	Kid/Mil	Man Hrs	Man Hrs	Kid/Mil	Man Hrs
	Killed	(Thou)	Man Hrs	Killed	(Thou)	Man Hrs
CLASS I RR (LIME-HAUL)						
EASTERN DISTRICT						
Antrak.....	---	14,231	0.00	---	5,011	0.00
Antrak - Northeast Corridor.....	---	---	**	1	---	**
Baltimore and Ohio Railroad.....	---	5,161	0.00	---	5,886	0.00
Bangor and Annotook Railroad.....	---	255	0.00	---	373	0.00
Bessemer and Lake Erie Railroad.....	---	995	0.00	---	409	0.00
Boston and Maine Corporation.....	---	1,427	0.00	---	1,244	0.00
Canadian Pacific Railway Company.....	---	50	0.00	---	282	0.00
Central Vermont.....	---	166	0.00	---	233	0.00
Chesapeake and Ohio Railway Company.....	1	9,707	0.10	2	4,700	0.43
Chicago and Illinois Midland Railway.....	---	154	0.00	---	154	0.00
Consolidated Rail Corp.....	---	40,597	0.00	3	34,612	0.09
Delaware and Hudson Railroad.....	---	981	0.00	---	707	0.00
Detroit and Toledo Shore Line Railroad.....	---	141	0.00	---	119	0.00
Detroit, Toledo and Tronton Railroad.....	---	694	0.00	---	317	0.00
Elgin, Joliet and Eastern Railway.....	---	1,487	0.00	---	1,034	0.00
Grand Trunk Western.....	---	3,078	0.00	---	1,740	0.00
Illinois Terminal Railroad.....	---	331	0.00	---	199	0.00
Long Island Railroad.....	---	2,542	0.00	---	1,842	0.00
Maine Central Railroad.....	---	541	0.00	---	748	0.00
Missouri-Illinois Railroad Co.....	---	1	0.00	---	36	0.00
Norfolk and Western Railway.....	---	11,169	0.00	1	9,590	0.10
Pittsburg and Lake Erie Railroad.....	---	1,178	0.00	---	606	0.00
Richmond Fredericksburg Rotomac RR.....	---	558	0.00	---	245	0.00
Western Maryland Railway.....	---	315	0.00	---	470	0.00
SUBTOTAL, EASTERN DISTRICT.....	1	95,759	0.01	7	69,925	0.10
SOUTHERN DISTRICT						
Alabama Great Southern Railroad.....	---	---	*	---	---	*
Autotrain Corporation.....	---	289	0.00	---	---	*
Central of Georgia Railroad Company.....	---	---	*	---	---	*
Cinn., N.O. & Texas Pacific Rwy.....	---	---	*	---	---	*
Clinchfield Railroad.....	---	190	0.00	---	377	0.00
Florida East Coast Railway.....	---	559	0.00	---	703	0.00
Georgia Railroad.....	---	95	0.00	---	108	0.00
Georgia Southern & Florida Railway.....	---	---	*	---	---	*
Illinois Central Gulf Railroad.....	---	8,321	0.00	3	7,096	0.42
Louisville and Nashville Railroad.....	---	6,922	0.00	1	5,617	0.18
Norfolk Southern Railway.....	---	247	0.00	---	---	*
Seaboard Coast Line Railroad.....	2	8,291	0.24	2	7,030	0.28
Southern Railway.....	---	9,476	0.00	2	6,910	0.29
SUBTOTAL, SOUTHERN DISTRICT.....	2	34,093	0.06	8	27,841	0.29
WESTERN DISTRICT						
Atchison, Topeka and Santa Fe Railway.....	1	15,033	0.07	3	12,248	0.24
Burlington Northern.....	---	20,649	0.00	---	19,439	0.00
Chicago and Northwestern.....	---	6,291	0.00	---	5,797	0.00
Chl., Milw., St. Paul & Pacific Railroad.....	1	5,543	0.18	1	4,506	0.22
Chicago, Rock Island & Pacific Railroad.....	---	3,644	0.00	3	3,175	0.94
Colorado and Southern Railway.....	---	137	0.00	---	361	0.00
Denver and Rio Grande Western Railroad.....	---	1,761	0.00	---	1,450	0.00
Duluth, Missabe and Iron Range Railway.....	---	635	0.00	---	561	0.00
Duluth, Winnipeg and Pacific Railway.....	---	132	0.00	---	234	0.00
Fort Worth and Denver Railway.....	---	247	0.00	---	611	0.00
Kansas City Southern Railway.....	---	1,208	0.00	---	1,302	0.00
Missouri-Kansas-Texas Railroad.....	---	1,349	0.00	---	1,029	0.00
Missouri Pacific Railroad.....	---	8,887	0.00	1	7,940	0.13
Northwestern Pacific Railroad.....	---	125	0.00	---	346	0.00
St. Louis-San Francisco Railway.....	---	3,440	0.00	---	3,150	0.00
St. Louis Southwestern Railway Company.....	---	1,614	0.00	---	1,568	0.00
Soo Line.....	1	2,089	0.48	---	2,206	0.00
Southern Pacific Trans. Company.....	---	18,616	0.00	2	11,934	0.17
Texas Mexican Railway Company.....	---	193	0.00	---	112	0.00
Toledo, Peoria and Western Railroad.....	---	255	0.00	---	189	0.00
Union Pacific Railroad.....	1	14,287	0.07	3	9,934	0.30
Western Pacific.....	---	1,471	0.00	---	1,015	0.00
SUBTOTAL, WESTERN DISTRICT.....	4	107,570	0.04	13	89,107	0.15
CLASS I RR (SWITCHING AND TERMINAL)						
EASTERN DISTRICT						
Alliuppa and Southern Railroad.....	---	295	0.00	---	192	0.00
Aiton and Southern Railroad.....	---	164	0.00	---	147	0.00
Balt. and Ohio Chicago Term. Railroad.....	---	244	0.00	---	341	0.00
Belt Railway Company of Chicago.....	---	451	0.00	---	326	0.00
Chicago, Union Station.....	---	267	0.00	---	81	0.00
Copansugh and Black Lick Railroad.....	---	77	0.00	---	216	0.00
Cuyahoga Valley Railway Company.....	---	91	0.00	---	102	0.00
Indiana Harbor Belt Railroad.....	---	745	0.00	---	475	0.00
Lakefront Dock and Railroad Terminal.....	---	14	0.00	---	19	0.00
Lake Terminal Railroad Company.....	---	146	0.00	---	165	0.00
Monongahela Connecting Railroad.....	---	170	0.00	---	139	0.00
Patapsco and Back Rivers Railroad.....	---	119	0.00	---	281	0.00

EMPLOYEES ON DUTY BY CLASS OF PERSON IN 1977
AND CLASS II RAILROADS

IV. Maintenance of Equipment and Stores			V. Via. Transportation not train, engine, yard			VIb. Transportation Train and Engine			TOTAL		
Killed	Man Hrs	Kld/Mil	Killed	Man Hrs	Kld/Mil	Killed	Man Hrs	Kld/Mil	Killed	Man Hrs	Kld/Mil
(Thou)			(Thou)			(Thou)			(Thou)		
---	9,909	0.00	---	7,971	0.00	---	---	---	---	37,122	0.00
---	---	---	---	---	---	---	---	---	---	---	---
---	6,446	0.00	---	3,700	0.00	---	11,149	0.00	---	31,742	0.00
---	383	0.00	---	111	0.00	---	292	0.00	---	1,414	0.00
---	799	0.00	---	144	0.00	---	371	0.00	---	2,716	0.00
---	1,352	0.00	---	448	0.00	---	1,739	0.58	---	6,210	0.16
---	29	0.00	---	64	0.00	---	112	0.00	---	537	0.00
---	132	0.00	---	76	0.00	---	175	0.00	---	782	0.00
---	8,837	0.00	---	3,049	0.00	---	10,038	0.00	---	36,331	0.08
---	197	0.00	---	105	0.00	---	81	0.00	---	691	0.00
2	41,861	0.05	---	12,625	0.00	14	57,203	0.24	19	186,896	0.10
---	937	0.00	---	227	0.00	---	1,308	0.00	---	4,160	0.00
---	145	0.00	---	20	0.00	---	113	0.00	---	538	0.00
---	790	0.00	---	169	0.00	---	866	0.00	---	2,836	0.00
---	1,020	0.00	---	356	0.00	---	1,702	0.00	---	5,599	0.00
---	1,893	0.00	---	642	0.00	---	2,666	0.00	---	9,419	0.00
---	387	0.00	---	53	0.00	---	442	0.00	---	1,212	0.00
---	3,823	0.00	---	817	0.00	---	2,912	0.00	---	11,904	0.00
---	549	0.00	---	213	0.00	---	516	0.00	---	2,567	0.00
---	32	0.00	---	28	0.00	---	125	0.00	---	222	0.00
---	9,350	0.00	---	3,048	0.00	4	13,726	0.29	5	46,883	0.11
---	1,270	0.00	---	216	0.00	---	1,066	0.00	---	4,336	0.00
---	604	0.00	---	86	0.00	---	495	0.00	---	1,988	0.00
---	501	0.00	---	114	0.00	---	935	0.00	---	2,335	0.00
2	91,046	0.02	---	33,682	0.00	19	108,032	0.18	29	398,444	0.07
---	---	---	---	---	---	---	---	---	---	---	---
---	532	0.00	---	454	0.00	---	---	---	---	1,275	0.00
---	---	---	---	---	---	---	---	---	---	---	---
---	---	---	---	---	---	---	---	---	---	---	---
---	379	0.00	---	173	0.00	1	666	1.50	1	1,785	0.56
---	312	0.00	---	111	0.00	---	530	0.00	---	2,215	0.00
---	3	0.00	---	76	0.00	---	416	0.00	---	646	0.00
---	---	---	---	---	---	---	---	---	---	---	---
---	9,596	0.00	1	2,203	0.45	4	10,273	0.39	8	37,489	0.21
---	7,216	0.00	---	2,097	0.00	5	11,390	0.44	6	33,242	0.18
---	---	---	---	---	---	---	---	---	---	---	---
1	8,948	0.11	---	3,080	0.00	3	12,286	0.24	8	39,635	0.20
---	7,483	0.00	---	3,010	0.00	1	13,459	0.07	3	40,338	0.07
1	34,469	0.03	1	17,204	0.09	14	49,020	0.29	26	156,627	0.17
---	---	---	---	---	---	---	---	---	---	---	---
1	14,311	0.07	---	3,846	0.00	3	15,409	0.19	8	60,847	0.13
---	19,698	0.00	---	6,525	0.00	2	20,852	0.10	2	87,163	0.02
---	5,650	0.00	---	2,292	0.00	2	8,252	0.24	2	28,282	0.07
---	3,922	0.00	---	1,850	0.00	1	7,086	0.14	3	22,907	0.13
---	3,088	0.00	---	1,449	0.00	---	5,471	0.00	3	16,827	0.18
---	2	0.00	---	20	0.00	---	588	0.00	---	1,108	0.00
---	1,728	0.00	---	464	0.00	---	1,910	0.00	---	7,309	0.00
---	656	0.00	---	283	0.00	1	433	2.31	1	2,568	0.39
---	157	0.00	---	89	0.00	---	158	0.00	---	770	0.00
---	233	0.00	---	227	0.00	---	845	0.00	---	2,163	0.00
---	1,007	0.00	---	303	0.00	---	2,253	0.00	---	6,073	0.00
---	893	0.00	---	306	0.00	2	1,671	1.20	2	5,248	0.38
---	7,442	0.13	---	2,512	0.00	3	12,563	0.24	5	39,344	0.13
---	44	0.00	---	56	0.00	---	291	0.00	---	774	0.00
---	3,197	0.00	1	1,020	0.38	2	4,574	0.44	3	15,345	0.20
---	1,809	0.00	---	391	0.00	---	2,364	0.00	---	7,746	0.00
1	1,816	0.55	---	706	0.00	---	2,287	0.00	2	9,104	0.22
---	14,131	0.00	---	3,298	0.00	5	17,860	0.28	7	65,839	0.11
---	82	0.00	---	41	0.00	---	123	0.00	---	551	0.00
---	186	0.00	---	83	0.00	---	257	0.00	---	970	0.00
---	10,762	0.00	---	2,902	0.00	7	10,109	0.69	11	47,594	0.23
---	788	0.00	---	272	0.00	---	1,272	0.00	---	4,818	0.00
3	91,598	0.03	1	28,937	0.03	28	116,538	0.24	49	433,750	0.17
---	---	---	---	---	---	---	---	---	---	---	---
---	174	0.00	---	50	0.00	---	323	0.00	---	944	0.00
---	163	0.00	---	46	0.00	---	557	0.00	---	1,077	0.00
---	405	0.00	---	198	0.00	---	656	0.00	---	1,844	0.00
---	418	0.00	---	114	0.00	---	591	0.00	---	1,900	0.00
---	56	0.00	---	253	0.00	---	---	---	---	657	0.00
---	144	0.00	---	71	0.00	---	284	0.00	---	792	0.00
---	100	0.00	---	12	0.00	---	251	0.00	---	556	0.00
---	782	0.00	---	165	0.00	1	1,554	0.64	1	3,721	0.27
---	11	0.00	---	7	0.00	---	---	---	---	51	0.00
---	102	0.00	---	9	0.00	---	249	0.00	---	671	0.00
---	192	0.00	---	37	0.00	---	248	0.00	---	786	0.00
---	166	0.00	---	59	0.00	1	413	2.42	1	1,038	0.96

(CONT.)

TABLE 207-A FATALITIES TO EMPLOYEES ON DUTY BY CLASS OF PERSON IN 1977
CLASS I AND CLASS II RAILROADS

	I. Exec Office Staff			II. Maintenance of Way and Structures			III. Maintenance of Equipment and Stores			IV. Transportation not train, engine, yard			V. Transportation Train and Engine			TOTAL		
	Killed	Man Hrs	Kid/Mil	Killed (Thou)	Man Hrs	Kid/Mil	Killed (Thou)	Man Hrs	Kid/Mil	Killed (Thou)	Man Hrs	Kid/Mil	Killed (Thou)	Man Hrs	Kid/Mil	Killed	Man Hrs	Kid/Mil
EASTERN DISTRICT (CONT.)																		
Phila., Bethlehem and New Eng. Railroad....	---	164	0.00	---	206	0.00	---	136	0.00	---	54	0.00	---	302	0.00	---	862	0.00
South Buffalo Railway.....	---	117	0.00	---	246	0.00	---	157	0.00	---	71	0.00	---	616	0.00	---	1,207	0.00
Union Railroad (Penna.).....	---	789	0.00	---	371	0.00	---	427	0.00	---	150	0.00	---	1,633	0.00	---	3,370	0.00
SUBTOTAL, EASTERN DISTRICT.....	---	3,763	0.00	---	3,307	0.00	---	3,433	0.00	---	1,296	0.00	---	7,677	0.26	2	19,476	0.10
SOUTHERN DISTRICT																		
Birmingham Southern Railroad.....	---	179	0.00	---	63	0.00	---	72	0.00	---	20	0.00	---	221	0.00	---	555	0.00
Kentucky and Indiana Terminal Railroad.....	---	246	0.00	---	68	0.00	---	160	0.00	---	96	0.00	---	355	0.00	---	965	0.00
SUBTOTAL, SOUTHERN DISTRICT.....	---	425	0.00	---	131	0.00	---	232	0.00	---	116	0.00	---	576	0.00	---	1,500	0.00
WESTERN DISTRICT																		
Houston Belt and Terminal Railway.....	---	680	0.00	---	225	0.00	---	166	0.00	---	183	0.00	---	888	0.00	---	2,022	0.00
Kansas City Terminal Railway.....	---	197	0.00	---	185	0.00	---	63	0.00	---	61	0.00	---	99	0.00	---	605	0.00
Port Terminal RR Assoc.....	---	183	0.00	---	117	0.00	---	134	0.00	---	69	0.00	---	464	0.00	---	967	0.00
Terminal Railroad Association of St. Louis.....	---	697	0.00	---	290	0.00	---	410	0.00	---	202	0.00	---	1,375	0.00	---	2,974	0.00
Texas Pacific-Missouri Pacific Terminal Rail.....	---	229	0.00	---	90	0.00	---	176	0.00	---	68	0.00	---	358	0.00	---	917	0.00
SUBTOTAL, WESTERN DISTRICT.....	---	1,946	0.00	---	907	0.00	---	949	0.00	---	539	0.00	---	3,144	0.00	---	7,485	0.00
CLASS II RAILROADS																		
SUBTOTAL, CLASS II.....	---	---	***	3	---	***	---	---	***	---	---	***	5	---	***	8	35,835	0.22
RECAPITULATION ALL DISTRICTS																		
Class I RR (Line-Haul).....	7	237,422	0.03	28	186,873	0.15	6	217,113	0.03	2	73,823	0.03	61	273,590	0.22	104	988,821	0.17
Class I RR (Switching and Terminal).....	---	6,134	0.00	---	4,385	0.00	---	4,634	0.00	---	1,951	0.00	2	11,397	0.18	2	28,461	0.07
CLASS II Railroads.....	---	---	***	3	---	***	---	---	***	---	---	***	5	---	***	8	35,835	0.22
TOTAL FOR ALL RAILROADS.....	7	243,556	0.03	31	191,218	0.16	6	221,747	0.03	2	75,774	0.03	68	284,987	0.24	114	1,053,117	0.17

** Included in Amtrak

* Included in Southern Railway System

*** Class II Railroad manhours are not available by occupational categories

TABLE 207-B INJURIES TO EMPLOYEES OF
CLASS I AND CLASS II

	I. Exec Office Staff			III. Maintenance of Way and Structures			IV. Equip
	Injured	Man Hrs	Inj/Mil	Injured(Thou)	Man Hrs	Inj/Mil	
CLASS I RR (LINE-HAUL)							
EASTERN DISTRICT							
Antrak.....	75	14,231	5.27	26	5,011	5.19	234
Antrak - Northeast Corridor.....	104	---	**	1,420	---	**	357
Baltimore and Ohio Railroad.....	52	5,161	10.08	421	5,886	71.53	259
Bangor and Aroostook Railroad.....	---	255	0.00	21	373	56.30	41
Bessemer and Lake Erie Railroad.....	3	995	3.02	58	409	141.81	92
Boston and Maine Corporation.....	13	1,427	9.11	64	1,244	51.85	66
Canadian Pacific Railway Company.....	---	50	0.00	32	282	113.48	1
Central Vermont.....	1	166	6.02	16	233	66.67	4
Chesapeake and Ohio Railway Company.....	57	9,707	5.87	333	4,700	70.45	407
Chicago and Illinois Midland Railway.....	1	154	6.49	57	154	370.13	20
Consolidated Rail Corp.....	431	40,597	10.62	4,163	34,612	120.28	3,061
Delaware and Hudson Railroad.....	1	981	1.02	12	707	16.97	32
Detroit and Toledo Shore Line Railroad.....	2	141	14.18	51	119	428.57	25
Detroit, Toledo and Ironton Railroad.....	9	694	12.97	45	317	141.96	85
Elgin, Joliet and Eastern Railway.....	29	1,487	19.50	91	1,034	88.01	105
Grand Trunk Western.....	34	3,078	11.05	69	1,140	60.53	159
Illinois Terminal Railroad.....	2	331	6.04	36	199	180.90	8
Long Island Railroad.....	59	2,542	23.21	165	1,810	91.76	299
Maine Central Railroad.....	6	541	11.09	59	748	78.88	53
Missouri-Illinois Railroad Co.....	---	---	0.00	2	35	55.56	---
Norfolk and Western Railway.....	117	11,169	10.48	869	9,590	90.62	768
Pittsburg and Lake Erie Railroad.....	14	1,178	11.88	91	606	150.17	203
Richmond Fredericksburg Potomac RR.....	7	558	12.54	41	245	167.35	91
Western Maryland Railway.....	10	315	31.75	36	470	76.60	28
SUBTOTAL, EASTERN DISTRICT.....	1,027	95,759	10.72	8,178	69,925	116.95	6,399
SOUTHERN DISTRICT							
Alabama Great Southern Railroad.....	3	---	*	20	---	*	2
Autotrain Corporation.....	8	289	27.68	---	---	*	147
Central of Georgia Railroad Company.....	3	---	*	23	---	*	4
Cinn., N.O. & Texas Pacific Rwy.....	2	---	*	11	---	*	2
Clinchfield Railroad.....	---	190	0.00	39	377	103.45	17
Florida East Coast Railway.....	1	559	1.79	13	703	18.49	3
Georgia Railroad.....	4	45	88.89	16	108	148.15	1
Georgia Southern & Florida Railway.....	---	---	---	18	---	---	---
Illinois Central Gulf Railroad.....	72	8,321	8.65	1,103	7,096	155.44	1,035
Louisville and Nashville Railroad.....	73	6,922	10.55	607	5,617	108.06	479
Norfolk Southern Railway.....	---	---	---	2	---	*	4
Seaboard Coast Line Railroad.....	46	8,291	5.55	457	7,030	65.01	479
Southern Railway.....	69	9,476	7.28	247	6,910	35.75	420
SUBTOTAL, SOUTHERN DISTRICT.....	281	34,093	8.24	2,556	27,841	91.81	2,597
WESTERN DISTRICT							
Atchafalpa, Topeka and Santa Fe Railway.....	66	15,033	4.39	550	12,248	44.91	516
Burlington Northern.....	196	20,649	9.49	2,255	19,439	116.00	1,375
Chicago and Northwestern.....	64	6,291	10.17	449	5,797	77.45	442
Chl., Milw., St. Paul & Pacific Railroad.....	90	5,543	16.24	421	4,506	93.43	262
Chicago, Rock Island & Pacific Railroad.....	41	3,648	11.25	333	3,175	104.88	233
Colorado and Southern Railway.....	1	137	7.30	36	361	99.72	---
Denver and Rio Grande Western Railroad.....	3	1,761	1.70	66	1,450	45.52	55
Duluth, Missabe and Iron Range Railway.....	3	635	4.72	38	561	67.74	45
Duluth, Winnipeg and Pacific Railway.....	---	132	0.00	12	234	51.28	5
Fort Worth and Denver Railway.....	3	287	12.15	62	611	134.21	14
Kansas City Southern Railway.....	5	1,208	4.14	116	1,302	89.09	54
Missouri-Kansas-Texas Railroad.....	8	1,349	5.93	87	1,029	84.55	56
Missouri Pacific Railroad.....	39	8,887	4.39	583	7,940	73.43	376
Northwestern Pacific Railroad.....	1	125	8.00	27	346	78.03	---
St. Louis-San Francisco Railway.....	25	3,404	7.34	285	3,150	90.48	284
St. Louis Southwestern Railway Company.....	21	1,614	13.01	147	1,568	93.75	130
Soo Line.....	19	2,089	9.10	200	2,206	90.66	167
Southern Pacific Trans. Company.....	273	18,616	14.66	958	11,934	80.27	965
Texas Mexican Railway Company.....	6	193	31.09	21	112	187.50	19
Toledo, Peoria and Western Railroad.....	8	255	31.37	15	189	79.37	18
Union Pacific Railroad.....	137	14,287	9.59	845	9,934	85.06	729
Western Pacific.....	10	1,471	6.80	70	1,015	68.97	63
SUBTOTAL, WESTERN DISTRICT.....	1,019	107,570	9.47	7,596	89,107	85.25	5,808
CLASS I RR (SWITCHING AND TERMINAL)							
EASTERN DISTRICT							
Alliquippa and Southern Railroad.....	7	205	34.15	20	192	104.17	29
Alton and Southern Railroad.....	1	164	6.10	9	147	61.22	17
Balt. and Ohio Chicago Term. Railroad.....	12	244	49.18	25	341	73.31	15
Belt Railway Company of Chicago.....	7	451	15.52	28	326	85.89	34
Chicago, Union Station.....	5	267	18.73	1	81	12.35	4
Conemaugh and Black Lick Railroad.....	---	77	0.00	13	216	60.19	9
Cuyahoga Valley Railway Company.....	1	91	10.99	4	102	39.22	9
Indiana Harbor Belt Railroad.....	9	745	12.08	45	475	94.74	40
Lakefront Dock and Railroad Terminal.....	---	14	0.00	---	19	0.00	---
Lake Terminal Railroad Company.....	3	146	20.55	23	165	139.39	8
Monongahela Connecting Railroad.....	1	170	5.88	21	139	151.08	27
Patapsco and Back Rivers Railroad.....	4	119	33.61	19	281	67.62	11

ON DUTY BY CLASS OF PERSON IN 1977 S II RAILROADS

Maintenance of Equipment and Stores			V. Via. Transportation not train, engine, yard			VIb. Transportation Train and Engine			-----TOTAL-----		
Man Hrs Inj/Mil (Thou)	Man Hrs	Injured	Man Hrs (Thou)	Inj/Mil Man Hrs	Injured	Man Hrs (Thou)	Inj/Mil Man Hrs	Injured	Man Hrs (Thou)	Inj/Mil Man Hrs	
9,909	23.61	457	7,971	57.33	1	---	---	793	37,122	21.36	
---	4*	60	---	4*	---	---	4*	1,941	---	4*	
6,446	40.18	34	3,100	10.97	643	11,149	57.67	1,409	31,742	44.39	
383	107.05	2	111	18.02	12	292	41.10	76	1,414	53.75	
799	115.14	4	144	27.78	35	371	94.34	192	2,718	70.64	
1,352	48.82	3	448	6.70	95	1,739	54.63	241	6,210	38.81	
29	34.48	2	64	31.25	10	112	89.29	45	537	83.80	
12	30.30	1	76	13.16	3	175	17.14	25	762	31.97	
8,837	46.06	72	3,049	23.61	705	10,038	70.23	1,574	36,331	43.32	
197	101.52	7	105	66.67	15	81	185.19	100	691	144.72	
41,861	73.12	186	12,625	14.73	2,784	57,203	48.67	10,625	186,898	56.85	
937	34.15	5	227	22.03	70	1,308	53.52	120	4,160	28.85	
145	172.41	---	20	0.00	31	113	274.34	109	538	202.60	
790	107.59	6	169	35.50	77	866	88.91	222	2,836	78.28	
1,020	102.94	9	356	25.28	180	1,702	105.76	414	5,599	73.94	
1,893	83.99	7	642	10.90	259	2,666	97.15	528	9,419	56.06	
167	42.78	---	53	0.00	38	442	85.97	84	1,212	69.31	
3,823	78.21	24	817	29.38	247	2,912	84.82	794	11,904	66.70	
549	96.54	1	213	4.69	73	516	141.47	192	2,567	74.80	
32	31.25	---	28	0.00	---	125	0.00	3	222	13.51	
9,350	82.14	43	3,048	14.11	880	13,726	64.11	2,677	46,883	57.10	
1,270	159.84	8	216	37.04	45	1,066	42.21	361	4,336	83.26	
604	150.66	3	86	34.88	48	495	96.97	190	1,968	95.57	
501	55.89	3	114	26.32	59	935	63.10	136	2,335	58.24	
91,046	70.28	937	33,682	27.82	6,310	108,032	58.41	22,851	398,444	57.35	
---	*	4	---	*	33	---	*	62	---	*	
532	276.32	34	454	74.89	---	---	*	189	1,275	148.24	
---	*	1	---	*	100	---	*	131	---	*	
---	*	---	---	*	48	---	*	63	---	*	
379	48.85	1	173	5.78	38	666	57.06	95	1,785	53.22	
312	9.62	2	111	18.02	11	530	20.75	30	2,215	13.54	
3	333.33	4	76	52.63	66	416	158.65	91	648	140.43	
---	*	---	---	*	21	---	*	44	---	*	
9,596	107.66	55	2,203	24.97	713	10,273	69.41	2,978	37,489	79.44	
7,216	66.24	47	2,097	22.41	809	11,390	71.03	2,014	33,242	60.59	
---	*	1	---	*	36	---	*	43	---	*	
8,948	53.53	72	3,080	23.38	810	12,286	65.93	1,864	39,635	47.03	
7,483	56.13	22	3,010	7.31	567	13,459	42.13	1,325	40,338	32.85	
34,469	75.34	243	11,204	21.69	3,252	49,020	66.34	8,929	156,627	57.01	
14,311	36.06	12	3,846	3.12	623	15,409	40.43	1,767	60,847	29.04	
19,698	69.60	137	6,525	21.00	1,530	20,852	73.37	5,493	87,163	63.02	
5,650	78.23	41	2,292	17.89	464	8,252	56.23	1,460	28,282	51.62	
3,922	66.80	33	1,850	17.84	556	7,086	78.46	1,362	22,907	59.46	
3,088	75.45	8	1,449	5.52	346	5,471	63.24	961	16,827	57.11	
2	0.00	1	20	50.00	46	588	78.23	84	1,108	75.61	
1,724	31.90	9	464	19.40	84	1,910	43.98	217	7,309	29.69	
656	68.60	5	283	17.67	22	433	50.81	113	2,568	44.00	
157	31.85	---	89	0.00	10	158	63.29	27	770	35.06	
233	60.09	1	227	4.41	54	845	63.91	154	2,163	71.20	
1,007	53.62	2	303	6.60	111	2,253	49.27	288	6,073	47.42	
893	62.71	2	306	6.54	126	1,671	75.40	279	5,248	53.16	
7,442	50.52	34	2,512	13.54	767	12,563	61.05	1,799	39,344	45.72	
44	0.00	---	58	0.00	13	201	64.68	41	774	52.97	
3,197	88.83	14	1,020	13.73	255	4,574	55.75	863	15,345	56.24	
1,809	71.86	17	391	43.48	211	2,364	89.26	526	7,746	67.91	
1,816	91.96	8	706	11.33	254	2,287	111.06	648	9,104	71.18	
14,131	68.29	59	3,298	17.89	1,477	17,860	82.70	3,732	65,839	56.68	
82	231.71	1	81	24.39	42	123	341.46	89	551	161.52	
186	96.77	2	63	24.10	16	257	62.26	59	970	60.82	
10,762	67.74	53	2,902	18.26	912	10,109	90.22	2,676	47,998	55.76	
788	79.95	4	272	14.71	150	1,272	117.92	297	4,818	61.64	
91,598	63.41	443	28,937	15.31	8,069	116,538	69.24	22,935	433,750	52.88	
174	166.67	---	50	0.00	25	323	77.40	81	944	85.81	
163	104.29	1	46	21.74	26	557	46.68	54	1,077	50.14	
405	37.04	2	198	10.10	53	656	80.79	107	1,844	58.03	
418	81.34	3	114	26.32	29	591	49.07	101	1,900	53.16	
56	71.43	6	253	23.72	---	---	---	16	657	24.35	
144	62.50	1	71	14.08	15	284	52.82	38	792	47.98	
100	90.00	---	12	0.00	21	251	83.67	35	556	62.95	
782	51.15	2	165	12.12	86	1,554	55.34	182	3,721	48.91	
11	0.00	---	7	0.00	5	---	---	5	51	98.08	
102	78.43	1	9	111.11	47	249	188.76	82	671	122.21	
192	140.63	---	37	0.00	16	248	64.52	65	786	82.70	
166	66.27	4	59	67.80	32	413	77.48	70	1,038	67.44	

(CONT.)

TABLE 207-B INJURIES TO EMPLOYEES
CLASS I AND CLASS II

	I. Exec Office Staff II. Prof., Clerical, General			III. Maintenance of Way and Structures			IV. Equip- ment		
	Injured	Man Hrs	Inj/Mil	Injured	Man Hrs	Inj/Mil	Injured	Man Hrs	Inj/Mil
EASTERN DISTRICT (CONT.)									
Phila., Bethlehem and New Eng. Railroad.....	---	164	0.00	4	206	19.42	4	206	19.42
South Buffalo Railway.....	---	117	0.00	16	286	65.04	6	286	65.04
Union Railroad (Penn.).....	4	789	5.07	35	371	94.34	41	371	94.34
SUBTOTAL, EASTERN DISTRICT:.....	54	3,763	14.35	263	3,307	79.53	254	3,307	79.53
SOUTHERN DISTRICT									
Birmingham Southern Railroad.....	2	179	11.17	14	63	222.22	13	63	222.22
Kentucky and Indiana Terminal Railroad.....	1	246	4.07	12	68	176.47	18	68	176.47
SUBTOTAL, SOUTHERN DISTRICT:.....	3	425	7.06	26	131	198.47	31	131	198.47
WESTERN DISTRICT									
Houston Belt and Terminal Railway.....	2	640	3.13	14	225	62.22	4	225	62.22
Kansas City Terminal Railway.....	2	197	10.15	10	185	54.05	3	185	54.05
Port Terminal RR Assoc.....	1	183	5.46	30	117	256.41	17	117	256.41
Terminal Railroad Association of St. Louis.	20	697	28.69	35	290	120.69	27	290	120.69
Texas Pacific-Missouri Pacific Terminal	2	229	8.73	7	90	77.78	3	90	77.78
RR.....	2	229	8.73	7	90	77.78	3	90	77.78
SUBTOTAL, WESTERN DISTRICT:.....	27	1,946	13.67	96	907	105.84	54	907	105.84
CLASS II RAILROADS									
SUBTOTAL, CLASS II:.....	105	---	***	1,002	---	***	593	---	***
RECAPITULATION									
ALL DISTRICTS									
Class I RR (Line-Haul).....	2,327	237,422	9.80	18,330	166,873	98.09	14,804	166,873	98.09
Class I RR (Switching and Terminal).....	84	6,134	13.69	385	4,345	88.61	339	4,345	88.61
Class II Railroads.....	105	---	***	1,002	---	***	593	---	***
TOTAL FOR ALL RAILROADS.....	2,516	243,556	10.33	19,717	171,218	103.11	15,736	171,218	103.11

** Included in Amtrak

* Included in Southern Railway System

*** Class II Railroad manhours are not
available by occupational categories

ON DUTY BY CLASS OF PERSON IN 1977
S II RAILROADS

Maintenance of ment and Stores			V. Via. Transportation not train, engine, yard			Vib. Transportation Train and Engine			-----TOTAL-----		
San Hrs	Inj/Mil		San Hrs	Inj/Mil		San Hrs	Inj/Mil		San Hrs	Inj/Mil	
ed (Thou)	San Hrs	Injured	(Thou)	San Hrs	Injured	(Thou)	San Hrs	Injured	(Thou)	San Hrs	Injured
136	29.41	---	54	0.00	12	302	39.74	20	862	23.20	
157	38.22	1	71	14.08	43	616	69.81	56	1,207	54.68	
427	96.02	5	150	33.33	81	1,633	49.60	166	3,370	49.26	
3,433	73.99	26	1,296	20.06	491	7,677	63.96	1,088	19,476	55.86	
72	180.56	4	20	200.00	9	221	40.72	42	555	75.68	
180	100.00	2	96	20.83	22	355	61.97	55	945	58.20	
252	123.02	6	116	51.72	31	576	53.82	97	1,500	64.67	
166	24.10	4	143	27.97	43	848	50.71	67	2,022	33.14	
63	47.62	---	61	0.00	2	99	20.20	17	605	28.10	
134	126.87	2	69	28.99	55	464	118.53	105	967	108.58	
410	65.85	2	202	9.90	105	1,375	76.36	189	2,974	63.55	
176	17.05	---	64	0.00	26	358	72.63	38	917	41.44	
949	56.90	8	539	14.84	231	3,144	73.47	416	7,485	55.58	
---	***	136	---	***	1,072	---	***	2,908	35,835	81.15	
217,113	68.19	1,623	73,823	21.99	17,631	273,590	64.44	54,715	988,821	55.33	
4,634	73.15	40	1,951	20.50	753	11,397	66.07	1,601	28,461	56.25	
---	***	136	---	***	1,072	---	***	2,908	35,835	81.15	
221,747	70.96	1,799	75,774	23.74	19,456	284,987	68.27	59,224	1,053,117	56.24	

TABLE 207-C ILLNESSES TO EMPLOYEES
CLASS I & II

	I. Exec Office Staff			III. Maintenance of Way and Structures		
	Man Hrs	Ill/Mil	Man Hrs	Illness (Thou)	Man Hrs	Ill/Mil
CLASS I RR (LINE-HAUL)						
EASTERN DISTRICT						
Astrak.....	5	14,231	0.35	---	5,011	0.00
Astrak - Northeast Corridor.....	2	---	##	142	---	##
Baltimore and Ohio Railroad.....	5	5,161	0.97	22	5,886	3.74
Bangor and Aroostook Railroad.....	---	255	0.00	---	373	0.00
Bessemer and Lake Erie Railroad.....	---	935	0.00	4	409	9.78
Boston and Maine Corporation.....	---	1,427	0.00	2	1,244	1.61
Canadian Pacific Railway Company.....	---	50	0.00	2	282	7.09
Central Vermont.....	---	166	0.00	1	233	4.29
Chesapeake and Ohio Railway Company.....	---	9,707	0.00	10	4,700	2.13
Chicago and Illinois Midland Railway.....	---	154	0.00	---	154	0.00
Consolidated Rail Corp.....	16	40,597	0.39	235	34,612	6.79
Delaware and Hudson Railroad.....	---	981	0.00	---	707	0.00
Detroit and Toledo Shore Line Railroad.....	---	141	0.00	1	119	8.40
Detroit, Toledo and Ironton Railroad.....	---	694	0.00	---	317	0.00
Elgin, Joliet and Eastern Railway.....	---	1,487	0.00	1	1,030	0.97
Grand Trunk Western.....	1	3,078	0.32	3	1,140	2.63
Illinois Terminal Railroad.....	---	331	0.00	2	199	10.05
Long Island Railroad.....	6	2,542	2.36	19	1,810	10.50
Maine Central Railroad.....	---	541	0.00	2	748	2.67
Missouri-Illinois Railroad Co.....	---	1	0.00	---	36	0.00
Norfolk and Western Railway.....	3	11,169	0.27	15	9,590	1.56
Pittsburg and Lake Erie Railroad.....	---	1,178	0.00	---	606	0.00
Richmond Fredericksburg Potomac RR.....	---	558	0.00	---	245	0.00
Western Maryland Railway.....	1	315	1.17	7	470	14.89
SUBTOTAL, EASTERN DISTRICT.....	39	95,759	0.41	468	69,925	6.69
SOUTHERN DISTRICT						
Alabama Great Southern Railroad.....	---	---	*	2	---	*
Autotrain Corporation.....	---	289	0.00	---	---	---
Central of Georgia Railroad Company.....	---	---	*	1	---	*
Cinn., N.O. & Texas Pacific Rwy.....	---	---	*	---	---	*
Clinchfield Railroad.....	---	190	0.00	1	377	2.65
Florida East Coast Railway.....	---	559	0.00	---	703	0.00
Georgia Railroad.....	---	45	0.00	---	108	0.00
Georgia Southern & Florida Railway.....	---	---	*	---	---	*
Illinois Central Gulf Railroad.....	1	8,321	0.12	55	7,096	7.75
Louisville and Nashville Railroad.....	5	6,922	0.72	13	5,617	2.31
Norfolk Southern Railway.....	---	---	*	1	---	*
Seaboard Coast Line Railroad.....	2	8,291	0.24	19	7,030	2.70
Southern Railway.....	1	9,476	0.11	3	6,910	0.43
SUBTOTAL, SOUTHERN DISTRICT.....	9	34,093	0.26	95	27,841	3.41
WESTERN DISTRICT						
Atchison, Topeka and Santa Fe Railway.....	1	15,033	0.07	11	12,248	0.90
Burlington Northern.....	4	20,649	0.19	139	19,439	7.15
Chicago and Northwestern.....	1	6,291	0.16	5	5,797	0.86
Chi., Milw., St. Paul & Pacific Railroad.....	3	5,543	0.54	4	4,506	0.89
Chicago, Rock Island & Pacific Railroad.....	1	3,644	0.27	7	3,175	2.20
Colorado and Southern Railway.....	---	137	0.00	1	361	2.77
Denver and Rio Grande Western Railroad.....	---	1,761	0.00	6	1,450	4.14
Duluth, Missabe and Iron Range Railway.....	---	635	0.00	---	561	0.00
Duluth, Winnipeg and Pacific Railway.....	---	132	0.00	---	234	0.00
Fort Worth and Denver Railway.....	---	247	0.00	2	611	3.27
Kansas City Southern Railway.....	---	1,208	0.00	3	1,302	2.30
Missouri-Kansas-Texas Railroad.....	---	1,349	0.00	4	1,029	3.89
Missouri Pacific Railroad.....	1	8,887	0.11	10	7,940	1.26
Northwestern Pacific Railroad.....	---	125	0.00	1	346	2.89
St. Louis-San Francisco Railway.....	---	3,404	0.00	7	3,150	2.22
St. Louis Southwestern Railway Company.....	---	1,614	0.00	6	1,568	3.83
Soe Line.....	1	2,089	0.48	20	2,206	9.07
Southern Pacific Trans. Company.....	5	18,616	0.27	55	11,934	4.61
Texas Mexican Railway Company.....	---	193	0.00	---	112	0.00
Toledo, Peoria and Western Railroad.....	---	255	0.00	3	189	15.87
Union Pacific Railroad.....	1	14,287	0.07	4	9,934	0.40
Western Pacific.....	---	1,471	0.00	8	1,015	3.94
SUBTOTAL, WESTERN DISTRICT.....	18	107,570	0.17	292	89,107	3.28
CLASS I RR (SWITCHING AND TERMINAL)						
EASTERN DISTRICT						
Alliquippa and Southern Railroad.....	---	205	0.00	---	192	0.00
Alton and Southern Railroad.....	---	164	0.00	---	147	0.00
Balt. and Ohio Chicago Term. Railroad.....	---	0.00	---	---	343	0.00
Belt Railway Company of Chicago.....	---	451	0.00	1	326	3.07
Chicago, Union Station.....	---	267	0.00	---	81	0.00
Coneaugh and Black Lick Railroad.....	---	77	0.00	---	216	0.00
Cuyahoga Valley Railway Company.....	---	91	0.00	---	102	0.00
Indiana Harbor Belt Railroad.....	---	745	0.00	1	475	2.11
Lakefront Dock and Railroad Terminal.....	---	14	0.00	---	15	0.00
Lake Terminal Railroad Company.....	---	146	0.00	---	165	0.00
Monongahela Connecting Railroad.....	---	170	0.00	---	139	0.00
Patapasco and Back Rivers Railroad.....	---	119	0.00	---	281	0.00

WORKERS ON DUTY BY CLASS OF PERSON IN 1977
AND CLASS II RAILROADS

IV. Maintenance of Equipment and Stores				V. Via. Transportation not train, engine, yard				VIb. Transportation Train and Engine				TOTAL.....			
Illness (Thou)	Man Hrs	Ill/Mil Man Hrs	Illness	Illness (Thou)	Man Hrs	Ill/Mil Man Hrs	Illness	Illness (Thou)	Man Hrs	Ill/Mil Man Hrs	Illness	Man Hrs	Ill/Mil Man Hrs	Man Hrs	Ill/Mil Man Hrs
3	9,909	0.30	16	7,971	2.01	---	---	---	---	---	24	37,122	0.65	---	---
11	---	---	2	---	---	---	---	---	---	---	157	---	---	---	---
10	6,446	1.55	1	3,100	0.32	---	26	11,749	2.33	---	64	31,742	2.02	---	---
---	383	0.00	---	111	0.00	---	---	292	0.00	---	---	1,414	0.00	---	---
2	759	2.50	---	104	0.00	---	---	371	0.00	---	6	2,718	2.21	---	---
---	1,352	0.00	---	448	0.00	---	9	1,739	5.18	---	11	6,210	1.77	---	---
---	29	0.00	---	64	0.00	---	---	112	0.00	---	2	537	3.72	---	---
---	132	0.00	---	76	0.00	---	---	175	0.00	---	1	782	1.28	---	---
13	8,837	1.47	1	3,049	0.33	---	10	10,038	1.00	---	34	36,331	0.94	---	---
---	997	0.00	---	105	0.00	---	---	81	0.00	---	---	691	0.00	---	---
139	41,861	3.32	5	12,625	0.40	---	103	57,203	1.80	---	498	186,698	2.66	---	---
---	937	0.00	---	227	0.00	---	2	1,308	1.53	---	2	4,160	0.48	---	---
---	145	0.00	---	20	0.00	---	---	113	0.00	---	1	538	1.86	---	---
---	790	0.00	---	169	0.00	---	---	866	0.00	---	---	2,836	0.00	---	---
---	1,020	0.00	---	356	0.00	---	2	1,702	1.18	---	3	5,599	0.54	---	---
2	1,893	1.06	---	642	0.00	---	2	2,666	0.75	---	8	9,419	0.65	---	---
---	187	0.00	---	53	0.00	---	---	482	0.00	---	2	1,212	1.65	---	---
15	3,623	3.92	---	817	0.00	---	15	2,912	5.15	---	55	11,904	4.62	---	---
1	549	1.82	---	213	0.00	---	2	516	3.88	---	5	2,567	1.95	---	---
---	32	0.00	---	28	0.00	---	---	125	0.00	---	---	222	0.00	---	---
5	9,350	0.53	2	3,048	0.66	---	13	13,726	0.95	---	38	46,083	0.61	---	---
2	1,270	1.57	1	216	4.63	---	1	1,066	0.94	---	4	6,336	0.92	---	---
---	604	0.00	---	86	0.00	---	1	495	2.02	---	1	1,988	0.50	---	---
---	501	0.00	---	114	0.00	---	2	935	2.14	---	10	2,335	4.28	---	---
203	91,046	2.23	28	33,682	0.83	---	188	108,032	1.74	---	926	396,444	2.32	---	---
---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
4	532	7.52	1	454	2.20	---	---	---	---	---	2	---	---	---	---
---	---	---	---	---	---	---	---	---	---	---	5	1,275	3.92	---	---
---	---	---	---	---	---	---	2	---	---	---	3	---	---	---	---
---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
---	379	0.00	---	173	0.00	---	---	666	0.00	---	1	1,785	0.56	---	---
7	312	0.00	---	111	0.00	---	---	530	0.00	---	---	2,215	0.00	---	---
---	3	0.00	---	76	0.00	---	---	416	0.00	---	---	648	0.00	---	---
---	---	---	---	---	---	---	1	---	---	---	1	---	---	---	---
12	9,596	1.25	1	2,203	0.45	---	12	10,273	1.17	---	81	37,489	2.16	---	---
15	7,216	2.08	---	2,097	0.00	---	13	11,390	1.14	---	46	33,242	1.38	---	---
---	---	---	---	---	---	---	2	---	---	---	3	---	---	---	---
5	8,948	0.56	2	3,080	0.65	---	2	12,286	0.16	---	30	39,635	0.76	---	---
8	7,483	1.07	1	3,010	0.33	---	2	13,459	0.07	---	14	40,338	0.35	---	---
44	36,469	1.28	5	11,204	0.45	---	33	49,020	0.67	---	186	156,627	1.19	---	---
---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
2	10,311	0.14	---	3,846	0.00	---	1	15,409	0.06	---	15	60,847	0.25	---	---
52	19,698	2.64	3	6,525	0.46	---	32	20,852	1.53	---	230	87,163	2.64	---	---
7	5,650	1.24	---	2,292	0.00	---	1	8,252	0.12	---	14	28,282	0.50	---	---
5	3,922	1.27	---	1,850	0.00	---	4	7,086	0.56	---	16	22,907	0.70	---	---
---	3,088	1.62	---	1,449	0.00	---	9	5,471	1.65	---	22	16,827	1.31	---	---
2	2	0.00	---	20	0.00	---	2	588	3.40	---	3	1,108	2.71	---	---
---	1,724	0.00	---	464	0.00	---	5	1,910	2.62	---	11	7,309	1.50	---	---
2	656	3.05	---	283	0.00	---	---	433	0.00	---	2	2,568	0.78	---	---
---	157	0.00	---	89	0.00	---	---	158	0.00	---	---	770	0.00	---	---
---	233	0.00	---	227	0.00	---	---	845	0.00	---	2	2,163	0.92	---	---
---	1,007	0.00	---	303	0.00	---	---	2,253	0.00	---	3	6,073	0.49	---	---
---	893	0.00	---	306	0.00	---	1	1,671	0.60	---	5	5,248	0.95	---	---
26	7,442	3.49	---	2,512	0.00	---	14	12,563	1.11	---	51	39,344	1.30	---	---
---	44	0.00	---	58	0.00	---	---	201	0.00	---	1	774	1.29	---	---
8	3,197	1.25	---	1,020	0.00	---	3	4,574	0.66	---	14	15,345	0.91	---	---
7	1,809	3.87	---	391	0.00	---	7	2,364	2.96	---	20	7,746	2.58	---	---
---	1,816	3.30	---	706	0.00	---	---	2,287	0.00	---	27	9,104	2.97	---	---
25	14,131	1.77	---	3,298	0.00	---	68	17,860	3.81	---	153	65,839	2.32	---	---
---	82	0.00	---	41	0.00	---	---	123	0.00	---	---	551	0.00	---	---
---	186	0.00	---	83	0.00	---	---	257	0.00	---	3	970	3.09	---	---
6	10,762	0.56	---	2,902	0.00	---	7	10,109	0.69	---	18	47,994	0.36	---	---
2	788	2.54	---	272	0.00	---	---	1,272	0.00	---	6	4,818	1.25	---	---
149	91,598	1.63	3	28,937	0.10	---	154	116,538	1.32	---	616	433,750	1.42	---	---
---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
1	174	5.75	---	50	0.00	---	---	323	0.00	---	1	944	1.06	---	---
---	163	0.00	---	46	0.00	---	---	557	0.00	---	---	1,077	0.00	---	---
---	805	0.00	---	198	0.00	---	1	656	1.52	---	---	1,840	0.54	---	---
---	818	0.00	---	114	0.00	---	---	591	0.00	---	1	1,900	0.53	---	---
---	56	0.00	---	253	0.00	---	---	---	---	---	---	657	0.00	---	---
2	144	13.89	---	71	0.00	---	---	284	0.00	---	2	792	2.53	---	---
1	100	10.00	---	12	0.00	---	---	251	0.00	---	1	556	1.80	---	---
1	782	1.28	---	165	0.00	---	2	1,554	1.29	---	4	3,721	1.07	---	---
---	11	0.00	---	7	0.00	---	---	---	---	---	---	51	0.00	---	---
---	102	0.00	---	9	0.00	---	---	249	0.00	---	---	671	0.00	---	---
---	192	0.00	---	37	0.00	---	---	248	0.00	---	---	766	0.00	---	---
---	166	0.00	---	59	0.00	---	---	413	0.00	---	---	1,038	0.00	---	---

(CONT.)

TABLE 207-C ILLNESSES TO EMPLOYEES OF
CLASS I AND CLASS II RAILROADS

	I. Exec Office Staff II. Prof., Clerical, General Illness			III. Maintenance of Way and Structures Illness			IV. Equip- ment Illness		
	Man	Hrs	Ill/Mil	Man	Hrs	Ill/Mil	Man	Hrs	Illness
EASTERN DISTRICT (CONT.)									
Phila., Bethlehem and New Eng. Railroad.....	---	164	0.00	---	206	0.00	---	2	---
South Buffalo Railway.....	---	117	0.00	---	246	0.00	---	---	---
Union Railroad (Penna.).....	---	789	0.00	3	371	8.09	---	---	---
SUBTOTAL, EASTERN DISTRICT:.....	---	3,763	0.00	5	3,307	1.51	---	7	---
SOUTHERN DISTRICT									
Birmingham Southern Railroad.....	---	179	0.00	---	63	0.00	---	---	---
Kentucky and Indiana Terminal Railroad.....	---	246	0.00	2	68	29.41	---	---	---
SUBTOTAL, SOUTHERN DISTRICT:.....	---	425	0.00	2	131	15.27	---	---	---
WESTERN DISTRICT									
Houston Belt and Terminal Railway.....	---	640	0.00	1	225	4.44	---	---	---
Kansas City Terminal Railway.....	---	197	0.00	---	185	0.00	---	---	---
Port Terminal RR Assoc.....	1	183	5.46	---	117	0.00	---	1	---
Terminal Railroad Association of St. Louis.....	---	697	0.00	---	290	0.00	---	---	---
Texas Pacific-Missouri Pacific Terminal Rail.....	---	229	0.00	---	90	0.00	---	---	---
SUBTOTAL, WESTERN DISTRICT:.....	1	1,946	0.51	1	907	1.10	---	1	---
CLASS II RAILROADS	---	---	---	---	---	---	---	---	---
SUBTOTAL, CLASS II:.....	---	---	***	12	---	***	---	---	8
RECAPITULATION ALL DISTRICTS									
Class I RR (Line-Haul).....	66	237,422	0.28	855	186,873	4.58	---	396	---
Class I RR (Switching and Terminal).....	1	6,134	0.16	8	4,345	1.84	---	8	---
Class II Railroads.....	---	---	***	12	---	***	---	---	---
TOTAL FOR ALL RAILROADS.....	67	243,556	0.28	875	191,218	4.58	---	412	---

** Included in Amtrak

* Included in Southern Railway System

*** Class II Railroad manhours are not
available by occupational categories

N DUTY BY CLASS OF PERSON IN 1977
S II RAILROADS

Maintenance of ment and Stores			V. Via. Transportation not train, engine, yard				VIb. Transportation Train and Engine				-----TOTAL-----		
Man Hrs	Ill/Mil		Man Hrs	Ill/Mil			Man Hrs	Ill/Mil			Man Hrs	Ill/Mil	
(Thou)	Man Hrs	Illness	(Thou)	Man Hrs	Illness	(Thou)	Man Hrs	Illness	(Thou)	Man Hrs		Man Hrs	
136	14.71	---	54	0.00	---	302	0.00	2	862	2.32			
157	0.00	---	71	0.00	---	616	0.00	---	1,207	0.00			
427	0.00	---	150	0.00	1	1,633	0.61	4	3,370	1.19			
3,433	2.04	---	1,296	0.00	4	7,677	0.52	16	19,476	0.82			
72	0.00	---	20	0.00	---	221	0.00	---	555	0.00			
180	0.00	---	96	0.00	---	355	0.00	2	945	2.12			
252	0.00	---	116	0.00	---	576	0.00	2	1,500	1.33			
166	0.00	---	143	0.00	5	848	5.90	6	2,022	2.97			
63	0.00	---	61	0.00	---	99	0.00	---	605	0.00			
134	7.46	---	69	0.00	11	464	23.71	13	967	13.44			
410	0.00	---	202	0.00	---	1,375	0.00	---	2,974	0.00			
176	0.00	---	64	0.00	2	358	5.59	2	917	2.18			
949	1.05	---	539	0.00	18	3,144	5.73	21	7,485	2.81			
---	***	2	---	***	15	---	***	37	35,835	1.03			
217,113	1.82	36	73,823	0.49	375	273,590	1.37	1,728	988,821	1.75			
4,634	1.73	---	1,951	0.00	22	11,397	1.93	39	26,461	1.37			
---	***	2	---	***	15	---	***	37	35,835	1.03			
221,747	1.86	38	75,774	0.50	412	284,987	1.45	1,804	1,053,117	1.71			

TABLE 207-D FATALITIES TO EMPLOYEES ON DUTY BY CLASS OF PERSON IN 1977
RAPID TRANSIT CARRIERS

	I. Exec Office Staff			III. Maintenance of Way and Structures			IV. Maintenance of Equipment and Stores			V. Via. Transportation not train, engine, yard			VIb. Transportation Train and Engine			TOTAL		
	Killed	Man Hrs	Kld/Mil	Killed	Man Hrs	Kld/Mil	Killed	Man Hrs	Kld/Mil	Killed	Man Hrs	Kld/Mil	Killed	Man Hrs	Kld/Mil	Killed	Man Hrs	Kld/Mil
Bay Area Rapid Transit (BART).....	---	---	*	---	---	*	---	---	*	---	---	*	---	---	*	---	3,744	0.00
Chicago Transit Authority.....	1	---	*	---	---	*	---	---	*	---	---	*	---	---	*	1	7,266	0.14
Cleveland Transit System.....	---	---	*	---	---	*	---	---	*	---	---	*	---	---	*	---	692	0.00
Mass. Bay Transportation Authority.....	---	---	*	---	---	*	---	---	*	---	---	*	---	---	*	---	3,626	0.00
New York City Trans. Authority (MTA).....	---	---	*	---	---	*	---	---	*	2	---	*	---	---	*	2	58,331	0.03
Port Authority Trans-Hudson.....	---	---	*	---	---	*	---	---	*	---	---	*	1	---	*	1	2,141	0.47
Port Autho. Trans. (PATCO) Lindenwood Ln....	---	---	*	---	---	*	---	---	*	---	---	*	---	---	*	---	617	0.00
Staten Island Rapid Transit Oper. Auth.....	---	---	*	---	---	*	---	---	*	---	---	*	---	---	*	---	998	0.00
Southeastern Pa. Trans. Authority.....	---	---	*	---	---	*	---	---	*	---	---	*	---	---	*	---	2,931	0.00
Washington Metro Transit Authority.....	---	---	*	---	---	*	---	---	*	---	---	*	---	---	*	---	1,528	0.00
Total.....	1	---	*	---	---	*	---	---	*	2	---	*	1	---	*	4	81,374	0.05

TABLE 207-E INJURIES TO EMPLOYEES ON DUTY BY CLASS OF PERSON IN 1977
RAPID TRANSIT CARRIERS

	I. Exec Office Staff			III. Maintenance of Way and Structures			IV. Maintenance of Equipment and Stores			V. Via. Transportation not train, engine, yard			VIb. Transportation Train and Engine			TOTAL		
	Injured	Man Hrs	Inj/Mil	Injured	Man Hrs	Inj/Mil	Injured	Man Hrs	Inj/Mil	Injured	Man Hrs	Inj/Mil	Injured	Man Hrs	Inj/Mil	Injured	Man Hrs	Inj/Mil
Bay Area Rapid Transit (BART).....	173	---	*	7	---	*	132	---	*	14	---	*	62	---	*	368	3,744	103.63
Chicago Transit Authority.....	78	---	*	93	---	*	108	---	*	13	---	*	256	---	*	548	7,266	75.42
Cleveland Transit System.....	---	---	*	3	---	*	4	---	*	---	---	*	14	---	*	21	692	30.35
Mass. Bay Transportation Authority.....	60	---	*	26	---	*	54	---	*	20	---	*	98	---	*	258	3,626	71.15
New York City Trans. Authority (MTA).....	629	---	*	585	---	*	565	---	*	358	---	*	257	---	*	2,394	58,331	41.04
Port Authority Trans-Hudson.....	9	---	*	56	---	*	36	---	*	5	---	*	18	---	*	124	2,141	57.92
Port Autho. Trans. (PATCO) Lindenwood Ln....	7	---	*	12	---	*	11	---	*	---	---	*	1	---	*	31	617	50.24
Staten Island Rapid Transit Oper. Auth.....	---	---	*	6	---	*	12	---	*	---	---	*	5	---	*	23	498	46.18
Southeastern Pa. Trans. Authority.....	2	---	*	17	---	*	24	---	*	20	---	*	47	---	*	110	2,931	37.53
Washington Metro Transit Authority.....	46	---	*	37	---	*	85	---	*	54	---	*	15	---	*	237	1,528	155.10
Total.....	1,004	---	*	842	---	*	1,031	---	*	484	---	*	773	---	*	4,134	81,374	50.80

TABLE 207-F ILLNESSES TO EMPLOYEES ON DUTY BY CLASS OF PERSON IN 1977
RAPID TRANSIT CARRIERS

	I. Exec Office Staff			III. Maintenance of Way and Structures			IV. Maintenance of Equipment and Stores			V. Via. Transportation not train, engine, yard			VIb. Transportation Train and Engine			TOTAL		
	Illness	Man Hrs	Ill/Mil	Illness	Man Hrs	Ill/Mil	Illness	Man Hrs	Ill/Mil	Illness	Man Hrs	Ill/Mil	Illness	Man Hrs	Ill/Mil	Illness	Man Hrs	Ill/Mil
Bay Area Rapid Transit (BART).....	5	---	*	---	---	*	5	---	*	---	---	*	2	---	*	12	3,744	3.21
Chicago Transit Authority.....	1	---	*	---	---	*	1	---	*	---	---	*	---	---	*	2	7,266	0.28
Cleveland Transit System.....	---	---	*	---	---	*	---	---	*	---	---	*	---	---	*	---	692	0.00
Mass. Bay Transportation Authority.....	---	---	*	---	---	*	---	---	*	---	---	*	3	---	*	3	3,626	0.83
New York City Trans. Authority (MTA).....	---	---	*	6	---	*	17	---	*	5	---	*	---	---	*	26	58,331	0.48
Port Authority Trans-Hudson.....	---	---	*	7	---	*	---	---	*	---	---	*	1	---	*	8	2,141	3.74
Port Autho. Trans. (PATCO) Lindenwood Ln....	---	---	*	---	---	*	---	---	*	---	---	*	---	---	*	---	617	0.00
Staten Island Rapid Transit Oper. Auth.....	---	---	*	---	---	*	---	---	*	---	---	*	---	---	*	---	498	0.00
Southeastern Pa. Trans. Authority.....	---	---	*	---	---	*	---	---	*	---	---	*	---	---	*	---	2,931	0.00
Washington Metro Transit Authority.....	---	---	*	1	---	*	---	---	*	1	---	*	---	---	*	2	1,528	1.31
Total.....	6	---	*	14	---	*	23	---	*	6	---	*	6	---	*	55	81,374	0.68

* Manhours are not available by occupational categories

TABLE 208-A INJURIES TO EMPLOYEES
CLASS I AND II RAIL

	Amputations.....						Fractures.....				
	Arm or Hand	Finger	Leg or Foot	Toe	Other Part	Total	Arm or Hand	Finger	Leg or Foot	Toe	
CLASS I RR (LINE-HAUL)											
EASTERN DISTRICT											
Astrak.....	---	1	---	---	---	1	7	13	11	5	
Astrak - Northeast Corridor.....	---	3	---	---	---	3	12	55	28	19	
Baltimore and Ohio Railroad.....	3	3	1	1	---	8	18	45	30	12	
Bangor and Aroostook Railroad.....	---	1	---	---	---	1	2	1	5	6	
Bessemer and Lake Erie Railroad.....	---	---	---	---	---	---	3	4	2	1	
Boston and Maine Corporation.....	---	---	---	---	---	---	10	5	14	4	
Canadian Pacific Railway Company.....	---	---	1	---	---	1	2	2	---	---	
Central Vermont.....	---	---	---	---	---	---	1	---	---	---	
Chesapeake and Ohio Railway.....	1	6	---	1	---	8	27	51	30	21	
Chicago and Illinois Midland Railway.....	---	---	---	---	---	---	1	---	---	---	
Consolidated Rail Corp.....	2	28	6	1	---	37	155	323	173	145	
Delaware and Hudson Railroad.....	---	---	1	1	---	2	1	3	3	---	
Detroit and Toledo Shore Line Railroad.....	---	---	---	---	---	---	---	2	1	---	
Detroit, Toledo and Ironton Railroad.....	---	---	---	---	---	---	---	2	6	---	
Elgin, Juliet and Eastern Railway.....	---	---	---	---	---	---	4	17	3	4	
Grand Trunk Western.....	---	2	---	---	---	2	2	6	9	6	
Illinois Terminal Railroad.....	---	---	---	---	---	---	1	2	1	---	
Long Island Railroad.....	---	1	1	---	---	2	5	10	9	10	
Maine Central Railroad.....	---	4	---	---	---	4	1	6	2	3	
Missouri-Illinois Railroad Co.....	---	---	---	---	---	---	---	1	---	---	
Norfolk and Western Railway.....	---	9	3	1	---	13	27	90	47	32	
Pittsburg and Lake Erie Railroad.....	---	---	1	---	---	1	1	8	6	1	
Richmond Fredericksburg Potomac RR.....	---	1	---	---	---	1	2	1	7	3	
Western Maryland Railway.....	---	---	---	---	---	---	1	7	4	1	
SUBTOTAL, EASTERN DISTRICT:	6	59	14	5	---	84	283	648	392	276	
SOUTHERN DISTRICT											
Alabama Great Southern Railroad.....	---	---	---	---	---	---	1	2	1	---	
Autotrain Corporation.....	---	2	---	---	---	2	1	3	1	---	
Central of Georgia Railroad Company.....	---	---	1	---	---	1	1	2	3	1	
Cinn., W.O. & Texas Pacific Rwy.....	---	---	1	---	---	1	---	1	---	2	
Clinchfield Railroad.....	---	1	---	---	---	1	1	1	3	2	
Florida East Coast Railway.....	---	1	---	---	---	1	---	---	1	1	
Georgia Railroad.....	---	---	---	1	---	1	3	2	---	---	
Georgia Southern & Florida Railway.....	---	---	---	---	---	---	---	---	---	---	
Illinois Central Gulf Railroad.....	1	7	1	---	1	10	26	98	35	18	
Louisville and Nashville Railroad.....	---	5	2	---	---	7	23	36	36	19	
Norfolk Southern Railway.....	---	---	---	---	---	---	---	---	---	---	
Seaboard Coast Line Railroad.....	---	8	1	2	---	11	13	46	37	12	
Southern Railway.....	---	2	2	---	---	4	20	38	21	18	
SUBTOTAL, SOUTHERN DISTRICT:	1	26	8	3	1	39	69	229	139	73	
WESTERN DISTRICT											
Atchison, Topeka and Santa Fe Railway.....	1	16	3	---	---	20	34	101	59	38	
Burlington Northern.....	---	12	3	---	1	16	55	148	94	83	
Chicago and Northwestern.....	---	8	2	---	---	10	9	35	16	7	
Chi., Milw., St. Paul & Pacific Railroad.....	---	4	1	---	---	5	27	46	26	17	
Chicago, Rock Island & Pacific Railroad.....	---	7	---	---	---	7	16	23	23	19	
Colorado and Southern Railway.....	---	2	---	---	---	2	---	---	3	2	
Denver and Rio Grande Western Railroad.....	---	2	---	---	---	2	7	10	13	2	
Duluth, Missabe and Iron Range Railway.....	---	1	---	---	---	1	1	3	1	---	
Duluth, Winnipeg and Pacific Railway.....	---	---	---	---	---	---	1	---	---	---	
Fort Worth and Denver Railway.....	---	---	1	1	---	1	5	6	2	---	
Kansas City Southern Railway.....	---	1	1	---	---	2	3	4	2	7	
Missouri-Kansas-Texas Railroad.....	---	---	---	---	---	---	1	8	3	5	
Missouri Pacific Railroad.....	2	9	4	2	---	17	17	53	49	22	
Northwestern Pacific Railroad.....	---	2	---	---	---	2	---	---	---	1	
St. Louis-San Francisco Railway.....	1	2	---	---	---	3	3	18	15	12	
St. Louis Southwestern Railway Company.....	1	1	2	1	---	5	7	7	10	2	
Soo Line.....	---	1	---	1	---	2	10	17	12	3	
Southern Pacific Transp. Company.....	2	8	2	---	1	13	37	73	60	33	
Texas Mexican Railway Company.....	---	---	---	---	---	---	2	1	---	---	
Toledo, Peoria and Western Railroad.....	---	1	---	---	---	1	---	---	1	---	
Union Pacific Railroad.....	1	8	1	2	---	12	41	125	68	49	
Western Pacific.....	---	---	---	---	---	---	1	5	5	2	
SUBTOTAL, WESTERN DISTRICT:	8	85	19	7	2	121	272	682	466	306	
CLASS I RR (SWITCHING AND TERMINAL)											
EASTERN DISTRICT											
Alaquippa and Southern Railroad.....	---	---	---	---	---	---	---	---	1	---	
Alton and Southern Railroad.....	---	---	---	---	---	---	2	---	1	1	
Balt. and Ohio Chicago Term. Railroad.....	---	---	---	---	---	---	1	6	---	3	
Belt Railway Company of Chicago.....	---	---	---	---	---	---	---	3	1	---	
Chicago, Union Station.....	---	---	---	---	---	---	---	---	---	---	
Coneaugh and Black Lick Railroad.....	---	1	---	---	---	1	2	---	---	---	
Cuyahoga Valley Railway Company.....	---	---	---	---	---	---	1	---	1	---	
Indiana Harbor Belt Railroad.....	---	---	---	---	---	---	3	5	5	2	
Lakefront Dock and Railroad Terminal.....	---	---	---	---	---	---	---	---	---	---	
Lake Terminal Railroad Company.....	---	---	---	---	---	---	---	---	1	1	
Monongahela Connecting Railroad.....	---	---	---	---	---	---	1	2	2	---	
Patapsco and Back Rivers Railroad.....	---	---	---	---	---	---	---	---	3	---	
Phila., Bethlehem and New Eng. Railroad.....	---	---	---	---	---	---	---	2	1	---	
South Buffalo Railway.....	---	---	---	---	---	---	---	---	---	---	
Union Railroad (Penna.).....	---	1	---	---	---	1	2	2	2	---	
SUBTOTAL, EASTERN DISTRICT:	---	2	---	---	---	2	12	23	19	7	
SOUTHERN DISTRICT											
Birmingham Southern Railroad.....	---	---	---	---	---	---	---	1	---	---	
Kentucky and Indiana Terminal Railroad.....	---	---	---	1	---	1	---	1	2	---	
SUBTOTAL, SOUTHERN DISTRICT:	---	---	---	1	---	1	---	2	2	---	

ON DUTY BY TYPE OF INJURY
ROADS, 1977

Face or Head	Other	Total	Sprain or Strain		Elec- Shock Cut or Burn		Other Burn	Dislo- cation	Cinder In Eye	Other	Total	Total In- juries	Total Fatal- ities
			Bruise	Strain	Cut	Burn							
1	1	38	257	254	106	3	43	6	26	59	754	793	---
6	7	127	426	733	340	20	39	6	146	101	1,811	1,941	---
9	18	132	342	476	259	1	30	6	102	53	1,269	1,409	---
---	1	15	19	21	11	---	4	5	---	---	60	76	---
---	3	13	24	91	16	---	9	1	29	9	179	192	---
---	4	37	39	74	58	---	5	2	20	6	204	241	1
---	1	5	8	12	14	---	1	2	2	---	39	45	---
---	1	3	6	4	9	---	1	---	---	1	22	25	---
4	24	157	349	642	238	3	26	12	105	34	1,409	1,574	3
---	2	26	36	19	---	5	---	11	---	1	98	100	---
55	133	984	2,300	3,454	1,966	64	291	63	1,159	307	9,604	10,625	19
---	1	8	44	39	13	---	---	---	3	11	110	120	---
---	2	5	36	31	19	---	---	---	13	1	104	109	---
1	10	53	78	38	11	---	11	4	20	12	212	222	---
---	2	24	116	56	84	---	19	---	53	22	390	414	---
1	6	32	113	202	74	---	6	2	51	46	494	528	---
---	---	4	21	34	10	---	---	1	9	5	80	84	---
---	4	38	243	263	115	25	14	2	75	17	754	794	---
---	3	15	39	72	32	---	3	1	19	7	173	192	---
---	1	2	---	1	---	---	---	---	---	---	1	3	---
12	33	241	620	971	372	6	78	11	282	83	2,423	2,677	5
1	3	20	79	102	62	---	52	---	19	26	340	361	---
1	2	16	45	59	40	1	6	1	19	2	173	190	---
---	1	14	31	44	28	---	4	---	13	2	122	136	---
91	252	1,942	5,236	7,789	3,919	123	651	120	2,182	805	20,825	22,851	28
---	1	5	18	17	11	---	1	---	10	---	57	62	---
1	5	11	30	76	29	---	5	2	27	7	176	189	---
---	---	8	29	33	24	---	2	1	32	1	122	131	---
1	4	14	23	15	11	---	1	1	4	---	58	63	---
1	---	8	22	30	18	---	1	---	14	1	86	95	1
---	2	9	5	9	---	---	---	---	3	1	27	30	---
1	---	7	17	42	8	---	5	---	70	1	83	91	---
---	1	1	8	15	14	---	---	---	13	5	43	44	---
15	25	217	780	974	442	4	22	98	329	133	2,751	2,978	8
4	19	137	464	728	349	4	40	11	169	85	1,670	2,014	6
---	1	1	13	12	5	---	---	---	12	---	42	43	---
7	13	128	414	704	323	5	35	12	165	67	1,725	1,864	8
5	16	118	246	470	229	1	40	2	191	24	1,203	1,325	3
36	81	647	2,024	3,129	1,476	32	228	42	991	321	8,243	8,929	26
9	22	263	340	483	428	7	36	15	99	76	1,484	1,767	8
22	64	466	1,150	2,263	915	5	116	27	365	130	5,011	5,493	2
10	15	92	272	552	285	---	57	10	79	103	1,358	1,460	2
17	14	147	307	585	197	---	57	8	57	21	1,200	1,362	3
3	9	93	199	293	139	2	17	11	143	57	861	961	---
---	1	6	15	41	11	---	---	---	9	---	76	84	---
2	34	39	59	43	---	---	3	4	23	10	181	217	---
1	---	6	18	47	13	1	4	1	20	2	106	113	1
1	---	2	6	4	3	---	---	---	5	1	25	27	---
1	1	15	26	52	31	---	1	1	24	3	138	154	---
---	2	18	63	116	36	1	7	2	34	9	268	288	---
2	7	26	37	90	27	---	6	1	80	12	253	279	2
3	17	161	360	618	288	10	42	10	227	66	1,621	1,799	5
---	---	1	8	12	12	---	2	---	3	1	38	41	---
2	13	63	152	263	140	16	25	5	140	56	797	863	3
---	6	32	121	187	86	2	13	1	65	14	489	526	---
2	6	50	133	258	101	3	10	5	71	15	596	648	2
12	38	253	882	1,327	535	9	91	27	457	138	3,466	3,732	7
---	---	3	30	23	8	---	5	1	14	5	86	89	---
---	1	14	23	12	---	---	1	---	6	1	57	59	---
6	44	333	542	907	506	9	65	23	188	91	2,331	2,676	11
1	---	14	56	111	36	---	5	---	64	11	283	297	---
92	261	2,079	4,810	8,314	3,857	65	541	153	2,173	822	20,735	22,935	47
---	---	3	28	29	5	---	10	---	4	2	78	81	---
---	5	16	18	12	---	---	2	---	1	---	49	54	---
---	10	30	39	16	---	---	1	1	7	3	97	107	---
---	4	33	38	17	1	---	2	1	4	1	97	101	---
---	4	4	1	5	---	---	1	---	1	---	12	16	---
---	2	14	11	3	---	---	1	1	3	2	35	38	---
---	2	18	12	2	---	---	1	---	---	---	33	35	---
---	1	16	47	19	1	---	2	---	13	6	166	182	1
---	---	2	2	---	---	---	---	---	1	---	5	5	---
---	1	3	17	27	7	---	3	---	12	13	79	82	---
---	5	17	17	10	---	---	2	1	10	3	60	65	---
---	1	4	13	16	16	---	4	---	15	2	66	70	1
---	---	7	13	7	---	---	---	---	---	---	20	20	---
---	3	2	18	12	---	---	1	---	29	1	63	66	---
---	1	7	14	72	17	---	2	---	49	4	158	166	---
---	6	68	262	391	141	2	32	4	149	37	1,018	1,088	2
---	---	1	10	6	9	---	3	---	9	2	41	42	---
---	3	14	18	9	---	---	3	---	3	4	51	55	---
---	4	24	26	18	---	---	6	---	12	6	92	97	---

(CONT.)

TABLE 208-A INJURIES TO EMPLOYEES
CLASS I AND II RAILROADS

	Amputations					Fractures				
	Arm or Hand	Finger	Leg or Foot	Toe	Other Part	Total	Arm or Hand	Finger	Leg or Foot	Toe
WESTERN DISTRICT										
Houston Belt and Terminal Railway.....	---	---	---	---	---	---	---	---	---	---
Kansas City Terminal Railway.....	---	---	---	---	---	---	---	2	---	---
Port Terminal RR Assoc.....	1	1	---	---	---	2	1	---	---	2
Terminal Railroad Association of St. Louis.	---	---	---	1	---	1	1	10	3	1
Texas Pacific-Missouri Pacific Terminal Rail.....	---	---	---	---	---	---	3	---	1	1
SUBTOTAL, WESTERN DISTRICT:.....	1	1	---	1	---	3	5	12	4	4
CLASS II RAILROADS										
SUBTOTAL, CLASS II:.....	1	9	2	2	---	14	15	44	37	16
RECAPITULATION ALL DISTRICTS										
Class I RR (Line-Haul).....	15	170	41	15	3	244	644	1,559	997	655
Class I RR (Switching and Terminal).....	1	3	---	2	---	6	17	37	25	11
Class II Railroads.....	1	9	2	2	---	14	15	44	37	18
TOTAL FOR ALL RAILROADS.....	17	182	43	19	3	264	676	1,640	1,059	684

TABLE 208-B INJURIES TO EMPLOYEES
RAPID TRANSIT CARRIAGES

	Amputations					Fractures				
	Arm or Hand	Finger	Leg or Foot	Toe	Other Part	Total	Arm or Hand	Finger	Leg or Foot	Toe
Bay Area Rapid Transit (BART).....	---	---	---	---	---	---	1	2	1	---
Chicago Transit Authority.....	---	---	---	---	---	---	3	15	3	1
Cleveland Transit System.....	---	---	---	---	---	---	---	---	---	---
Mass. Bay Transportation Authority.....	---	1	---	---	---	1	3	4	2	1
New York City Trans. Authority (MTA).....	---	---	---	---	---	---	25	42	31	22
Port Authority Trans-Hudson.....	---	---	---	---	---	---	4	2	1	---
Port Autho. Trans. (PATCO) Lindenwood Ln.....	---	---	---	---	---	---	---	---	2	1
Staten Island Rapid Transit Oper. Auth.....	---	1	---	---	---	1	---	2	---	---
Southeastern Pa. Trans. Authority.....	---	---	---	---	---	---	1	---	1	1
Washington Metro Transit Authority.....	---	---	---	---	---	---	---	2	---	---
Total.....	---	2	---	---	---	2	37	69	41	26

ON DUTY BY TYPE OF INJURY
ROADS, 1977

Face or Head	Other Injuries.....										Total In- juries	Total Fatal- ities	
	Other	Total	Bruise	Sprain or Strain	Cut or Burn	Elec Shock or Burn	Other Burn	Dislo- cation	Cinder in Eye	Other			Total
---	1	1	12	28	10	---	1	---	14	1	66	67	---
---	1	3	2	6	4	---	1	---	---	1	14	17	---
---	---	3	28	38	11	---	6	---	15	2	100	105	---
1	1	17	76	64	18	1	5	---	5	2	171	189	---
---	---	5	8	15	8	---	---	---	2	---	33	38	---
1	3	29	126	151	51	1	13	---	36	6	384	416	---
6	29	149	775	969	440	14	95	20	331	101	2,745	2,908	8

219	594	4,668	12,070	19,232	9,252	220	1,420	315	5,346	1,948	49,803	54,715	101
2	9	101	412	568	210	3	51	4	197	49	1,494	1,601	2
6	29	149	775	969	440	14	95	20	331	101	2,745	2,908	8
227	632	4,918	13,257	20,769	9,902	237	1,566	339	5,874	2,098	54,042	59,224	111

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ON DUTY BY TYPE OF INJURY
ERS, 1977

Face or Head	Other Injuries.....											Total In- juries	Injury Fatal- ities
	Other	Total	Bruise	Sprain or Strain	Cut or Burn	Elec Shock Burn	Other Burn	Dislo- cation	Cinder In Eye	Other	Total		
---	---	4	104	163	67	3	2	---	34	11	384	388	---
---	3	25	221	102	104	24	8	1	50	13	523	546	1
---	---	---	7	7	3	---	---	---	1	3	21	21	---
1	3	14	65	96	33	14	---	1	22	12	243	258	---
4	12	136	663	950	264	21	19	8	88	245	2,256	2,394	2
---	---	7	31	28	23	5	1	---	26	3	117	124	1
---	---	3	2	10	9	---	---	---	6	1	28	31	---
---	---	2	2	1	6	3	---	---	7	1	20	23	---
---	---	3	37	42	13	4	7	---	1	3	107	110	---
---	---	2	106	64	38	2	3	---	12	10	235	237	---
5	18	196	1,238	1,463	560	76	40	10	247	302	3,936	4,134	4

TABLE 210 ACCIDENTS INVOLVING TRAINS
TRANSPORTING HAZARDOUS MATERIALS
CLASS I AND CLASS II RAILROADS, 1976

Railroad	Consists In hazmat Accidents	Total Cars in Consist	Total cars Containing Hazmat	Total cars Damaged W/hazmat	Total cars Releasing Hazmat	People Evacuated	Equipment Dollar Damages
CLASS I RR (LINE-HAUL)							
EASTERN DISTRICT							
Amtrak	---	---	---	---	---	---	---
Amtrak - Northeast Corridor	2	125	5	4	1	---	---
Baltimore and Ohio Railroad	41	2,863	133	50	17	604	1,324,225
Bangor and Aroostook Railroad	6	716	20	2	1	50	250,700
Bessemer and Lake Erie Railroad	---	---	---	---	---	---	---
Boston and Maine Corporation	9	606	42	5	---	1,000	235,600
Canadian Pacific Railway Company	1	67	1	---	---	---	3,600
Central Vermont	1	47	3	---	---	---	2,344
Chesapeake and Ohio Railway Company	16	1,085	48	17	9	2,000	876,912
Chicago and Illinois Midland Railway	---	---	---	---	---	---	---
Consolidated Rail Corp.	76	5,343	356	98	17	280	1,898,175
Delaware and Hudson Railroad	---	---	---	---	---	---	---
Detroit and Toledo Shore Line Railroad	---	---	---	---	---	---	---
Detroit, Toledo and Ironton Railroad	---	---	---	---	---	---	---
Elgin, Joliet and Eastern Railway	---	---	---	---	---	---	---
Grand Trunk Western	3	125	5	5	2	2	6,100
Illinois Terminal Railroad	5	336	6	6	2	---	22,282
Long Island Railroad	---	---	---	---	---	---	---
Maine Central Railroad	12	616	29	2	1	40	192,440
Missouri-Illinois Railroad Co.	---	---	---	---	---	---	---
Norfolk and Western Railway	14	1,379	58	5	2	10	1,108,910
Pittsburg and Lake Erie Railroad	---	---	---	---	---	---	---
Richmond Fredericksburg Potomac RR	10	794	19	1	---	---	108,435
Western Maryland Railway	1	74	1	---	---	---	2,000
SUBTOTAL, EASTERN DISTRICT:	197	14,176	726	195	52	3,986	6,031,723
SOUTHERN DISTRICT							
Alabama Great Southern Railroad	2	216	29	7	---	---	6,950
Autotrain Corporation	---	---	---	---	---	---	---
Central of Georgia Railroad Company	1	8	1	1	---	---	2,000
Cinn., N.O. & Texas Pacific Rwy	---	---	---	---	---	---	---
Clinchfield Railroad	6	480	8	3	1	---	279,094
Florida East Coast Railway	---	---	---	---	---	---	---
Georgia Railroad	---	---	---	---	---	---	---
Georgia Southern & Florida Railway	2	123	12	1	---	---	11,575
Illinois Central Gulf Railroad	81	5,228	305	119	10	2,500	2,336,502
Louisville and Nashville Railroad	52	4,006	278	110	19	2,855	6,063,224
Norfolk Southern Railway	---	---	---	---	---	---	---
Seaboard Coast Line Railroad	18	1,519	96	35	7	---	1,350,090
Southern Railway	6	453	16	10	---	---	170,800
SUBTOTAL, SOUTHERN DISTRICT:	168	12,033	745	286	37	5,355	10,220,235
WESTERN DISTRICT							
Atchison, Topeka and Santa Fe Railway	41	2,000	204	51	14	118	3,133,790
Burlington Northern	20	932	52	36	4	180	1,186,069
Chicago and Northwestern	22	1,894	57	28	6	1,500	1,090,263
Chi., Milw., St. Paul & Pacific Railroad	29	2,140	143	32	6	---	1,571,705
Chicago, Rock Island & Pacific Railroad	41	2,221	117	66	6	144	651,338
Colorado and Southern Railway	---	---	---	---	---	---	---
Denver and Rio Grande Western Railroad	---	---	---	---	---	---	---
Duluth, Missabe and Iron Range Railway	---	---	---	---	---	---	---
Duluth, Winnipeg and Pacific Railway	---	---	---	---	---	---	---
Fort Worth and Denver Railway	5	405	8	2	---	---	34,284
Kansas City Southern Railway	16	1,449	95	18	3	10	432,081
Missouri-Kansas-Texas Railroad	11	714	31	15	2	---	116,600
Missouri Pacific Railroad	44	3,507	310	62	9	1,550	2,240,503
Northwestern Pacific Railroad	1	3	1	1	1	---	3,500
St. Louis-San Francisco Railway	31	2,027	139	58	7	---	1,927,330
St. Louis Southwestern Railway Company	8	808	81	3	1	---	728,430
Soo Line	46	3,071	248	17	2	---	311,395
Southern Pacific Trans. Company	72	6,218	256	73	11	3	3,000,320
Texas Mexican Railway Company	1	50	4	1	---	---	3,961
Toledo, Peoria and Western Railroad	3	255	10	---	---	---	159,436
Union Pacific Railroad	36	2,571	127	23	3	---	1,438,779
Western Pacific	13	941	44	1	---	9	481,680
SUBTOTAL, WESTERN DISTRICT:	440	31,206	1,927	487	77	3,514	18,511,484
CLASS I RR (SWITCHING AND TERMINAL)							
EASTERN DISTRICT							
Aliquippa and Southern Railroad	1	2	1	1	1	---	6,500
Alton and Southern Railroad	4	176	6	6	---	---	34,800
Balt. and Ohio Chicago Term. Railroad	---	---	---	---	---	---	---

(CONT.)

TABLE 210 ACCIDENTS INVOLVING TRAINS
TRANSPORTING HAZARDOUS MATERIALS
CLASS I AND CLASS II RAILROADS, 1976

Railroad	Consists In hazmat Accidents	Total Cars in Consist	Total cars Containing Hazmat	Total cars Damaged w/hazmat	Total cars Releasing Hazmat	People Evacuated	Equipment Dollar Damages
EASTERN DISTRICT (CONT.)							
Belt Railway Company of Chicago	13	1,150	49	2	1	---	20,510
Chicago, Union Station	---	---	---	---	---	---	---
Conemaugh and Black Lick Railroad	---	---	---	---	---	---	---
Cuyahoga Valley Railway Company	---	---	---	---	---	---	---
Indiana Harbor Belt Railroad	4	335	60	3	---	---	2,300
Lakefront Dock and Railroad Terminal	---	---	---	---	---	---	---
Lake Terminal Railroad Company	---	---	---	---	---	---	---
Monongahela Connecting Railroad	---	---	---	---	---	---	---
Patapsco and Back Rivers Railroad	---	---	---	---	---	---	---
Phila., Bethlehem and New Eng. Railroad	---	---	---	---	---	---	---
South Buffalo Railway	---	---	---	---	---	---	---
Union Railroad (Penna.)	---	---	---	---	---	---	---
SUBTOTAL, EASTERN DISTRICT:	22	1,663	116	12	2	---	64,110
SOUTHERN DISTRICT							
Birmingham Southern Railroad	---	---	---	---	---	---	---
Kentucky and Indiana Terminal Railroad	---	---	---	---	---	---	---
SUBTOTAL, SOUTHERN DISTRICT:	---	---	---	---	---	---	---
WESTERN DISTRICT							
Houston Belt and Terminal Railway	---	---	---	---	---	---	---
Kansas City Terminal Railway	---	---	---	---	---	---	---
Port Terminal RR Assoc.	---	---	---	---	---	---	---
Terminal Railroad Association of St. Louis	---	---	---	---	---	---	---
Texas Pacific-Missouri Pacific Terminal Rail	---	---	---	---	---	---	---
SUBTOTAL, WESTERN DISTRICT:	---	---	---	---	---	---	---
CLASS II RAILROADS							
SUBTOTAL, CLASS II:	37	1,760	334	92	5	1,250	1,578,847
RECAPITULATION ALL DISTRICTS							
Class I RR (Line-Haul)	805	57,415	3,398	968	166	12,855	34,763,442
Class I RR (Switching and Terminal)	22	1,663	116	12	2	---	64,110
Class II Railroads	37	1,760	334	92	5	1,250	1,578,847
TOTAL FOR ALL RAILROADS	864	60,838	3,848	1,072	173	14,105	36,406,399

APPENDIX

REPORTABILITY REQUIREMENTS

The rules governing monthly reporting of railroad accidents/incidents which were in effect at the close of 1977 define a reportable accident/incident as an event arising from the operation of a railroad that results, with minor exceptions, in one or more of the following circumstances:

- (a) Any impact between railroad on-track equipment and an automobile, bus, truck, motorcycle, bicycle, farm vehicle, or pedestrian at a rail-highway grade crossing;
- (b) Any collision, derailment, fire, explosion, act of God, or other event involving operation of railroad on-track equipment (standing or moving) which results in more than \$2,300 in damages to railroad on-track equipment, signals, track, track structures, and roadbed;
- (c) Any event arising from the operation of a railroad which results in:
 - (i) death of one or more persons;
 - (ii) injury to one or more persons, other than railroad employees, that requires medical treatment
 - (iii) injury to one or more employees that requires medical treatment or results in restriction of work or motion for one or more days, one or more lost workdays, transfer to another job, termination of employment, or loss of consciousness; or
 - (iv) any occupational illness of a railroad employee, as diagnosed by a physician.

CLASSIFICATION OF ACCIDENTS/INCIDENTS

Train Accidents are events, with or without casualties, arising in connection with the operation of railroad on-track equipment which satisfy the conditions specified in (b) above. The damage threshold for reporting train accidents from 1957 through 1974 was \$750. In 1975 the threshold was increased to \$1,750, and in 1977 to \$2,300. The reporting threshold is reviewed periodically and adjusted every two years as necessary.

Train Incidents are events arising in connection with the movement of railroad on-track equipment which result in a reportable death, injury or illness, but do not result in damage to railroad equipment, track or roadbed of more than \$2,300.

Nontrain Incidents are events which result in a reportable death, injury or illness arising from the operation of a railroad, but not from the movement of railroad on-track equipment.

CLASSIFICATION OF CASUALTIES

Fatalities: Prior to 1975, a death which resulted from railroad operations, but which occurred more than 24 hours after the injury, was reported as an injury and a subsequent fatality. Such fatal injuries now are classified as fatalities. In addition, fatalities resulting from occupational illnesses, if they occur within 365 days of the initial diagnosis of the illness are now reportable. These were not reportable prior to 1975.

Nonfatal Casualties: This is any injury or illness caused by a railroad accident/incident that is nonfatal, and includes the following:

Occupational Injuries: Major changes were made in the definition of a reportable injury in 1975. This was done to allow comparability of railroad industry statistics with those published by the Occupational Safety and Health Administration (OSHA) for other industries. Previous regulations required the reporting of any employee injury which prevented the employee from performing normally assigned duties for more than 24 hours in the aggregate during 10 days immediately following the injury. This resulted in the reporting of only those injuries causing at least 2 days of lost or restricted time. The revised regulation requires the reporting of any employee injury which results in one or more lost or restricted workdays, the administration of medical treatment beyond first aid, transfer to another job, termination of employment, or loss of consciousness. In addition, the case remains active for 365 days rather than the 10-day period previously specified. An injury to a person other than an employee-on-duty was formerly reportable if it prevented the customary vocation or mode of life of the injured person for more than 24 hours during the 10 days immediately following the injury. Such an injury is presently reportable if the injured person requires medical treatment beyond first aid. Lost and/or restricted workdays are tabulated only for employee-on-duty injuries and illnesses.

Occupational Illnesses: This is a new category with no counterpart in casualty statistics prior to 1975, and applies to employees only. An occupational illness is any abnormal condition or disorder, other than one resulting from an injury, which is caused by environment factors associated with an employee's employment, including but not limited to acute and chronic illness or diseases which may be caused by inhalation.

CLASSIFICATION OF PERSONS

Employees "on duty" are those persons who are engaged in the operation of a railroad. Ordinarily the fact that the employee is or is not under pay will determine this. However, employees on railroad property while

on rest or meal periods, "trading time", or doing work which they are expected to do but actually perform before pay starts or after pay stops, are considered to be employees "on duty".

Employees "not on duty" are those employees who are on railroad property for purposes connected with their employment or with other railroad permission, but who are not "on duty" as defined above.

Passengers are persons on, boarding, or alighting from railroad cars for the purpose of travel.

Nontrespassers are persons who are lawfully on that part of railroad property which is used in railroad operation (other than those herein defined as employees, passengers, or trespassers), and persons adjacent to railroad premises when injured as the result of the operation of a railroad.

Trespassers are persons who are on that part of railroad property used in railroad operation, and whose presence is prohibited, forbidden, or unlawful. Employees who are injured while trespassing are categorized as "trespassers". Also, a person on a rail-highway grade crossing is classified as a "trespasser" if the crossing is protected by gates or other barriers which are closed when the person enters the crossing, or if a person attempts to pass over or under trains or cars at the crossing.

Contractor employees are persons who are employed by a contractor engaged by a railroad to perform normal maintenance work to railroad rolling stock, track structure, bridges, building, etc.

CLASSIFICATION OF ON-TRACK EQUIPMENT

Train - A train is a locomotive unit(s) coupled, with or without cars and with or without markers displayed. Included in this definition are those trains consisting entirely of self-propelled units designed to carry passengers and/or freight traffic.

Locomotive - A locomotive is a self-propelled unit of equipment designed for moving other equipment. It includes a self-propelled unit designed to carry freight and/or passenger traffic.

Car - A car is any unit of equipment designed to be hauled by locomotives, or any unit of on-track work equipment such as a track motorcar, highway-rail car, on-track crane, on-track ballast tamping machine, etc.

Equipment Consist - An equipment consist is a train, locomotive(s), cut of cars, or any single car not coupled to another car or locomotive.

Class I Railroads are those railroads having annual operating revenue in excess of \$10,000,000, including switching and terminal companies.

Class II Railroads are those having annual operating revenue of \$10,000,000 or less.

Rail Rapid Transit is the operation of a short haul passenger train exclusively within an urban/suburban or metropolitan area. It includes a passenger train provided by an instrumentality of a state or political subdivision thereof.

Trainmen, the term as it is used in this publication, includes engineers and motormen, firemen and helpers, conductors, brakemen, and flagmen engaged in passenger, freight, yard or work service and train baggagemen, but does not include hostlers.

Man-hours refers to the service hours or days worked by employees, as shown on the "Monthly Report of Employees, Service, and Compensation" (ICC Wage Statistics, Form A and B) for Class I Railroads. For all other categories of railroads, this information is a total of employee hours worked as reported on the monthly Railroad Injury and Illness Summary (FRA F 6180-55).

Medical Treatment is treatment administered by a physician or by registered professional personnel under the standing orders of a physician. Medical treatment does not include first aid treatment (one-time treatment), precautionary measures such as tetanus shots, or subsequent observation of minor scratches, cuts, bruises, splinters, etc., which do not require medical care, even though these services were provided by a physician or registered professional personnel.

Lost Workdays - This term applies to employees only. It includes all full days or parts of days the employee, because of injury or occupational illness, is away from work (consecutive or not) on regularly assigned workdays (except on the day of injury or first day of illness).

Restriction of Work or Motion - This term applies to employees only. Restriction of work or motion occurs when an employee, because of injury or occupational illness, is assigned to a temporary job, works less than full time at a permanent job, or is unable to perform all normally assigned duties.

Locomotive Mile is a movement under its own power of a locomotive a distance of one mile. This item covers miles run by locomotives in road service and in train and yard-switching service. Switching miles are computed at the rate of six miles per hour for the time actually engaged in such service. A motor train-mile is a movement under its own power of a motor train a distance of one mile.

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