



FOR THE YEAR ENDED DECEMBER 31, 1976

**RAIL-HIGHWAY
GRADE-CROSSING
ACCIDENTS/INCIDENTS BULLETIN**

**DEPARTMENT OF TRANSPORTATION
FEDERAL RAILROAD ADMINISTRATION
OFFICE OF SAFETY**

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INTRODUCTION

In accordance with 49 CFR 225, railroads are required to file monthly accident/incident reports with the Office of Safety, Federal Railroad Administration. For the purposes of these requirements a "railroad" is any system of surface transportation of persons and property over rails, including line haul freight and passenger railroads, switching and terminal railroads, and passenger carrying railroads, such as rapid transit, commuter, scenic, street, subway, elevated, cable and cog railways.

The purpose of reporting to the Federal Railroad Administration (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.

This is the forty-second annual statistical report on rail-highway grade crossing accidents/incidents based upon reports of rail carriers filed with the Federal Railroad Administration. The purpose of this report is to direct attention to the hazards inherent to public grade crossings, and to provide basic statistical information in support of the overall Department of Transportation program to promote the safety of both rail and highway traffic at crossings. Data in this report is not such as to identify all factors leading to rail-highway grade crossing accidents; however, the tabular information provides valuable material for use in identifying specific conditions surrounding crossing accidents.

Due to major revisions in reporting requirements effective January 1, 1975, a direct comparison of 1975 and later years' with previous data is not feasible. These major changes are in the following categories (refer to Appendix A, Definitions):

1. Rail Equipment Accidents/Incidents (Train Accidents). From 1957 through 1974, the damage threshold for reporting train accidents remained at \$750. In 1975, the threshold was increased to \$1,750, significantly reducing the number of reportable accidents. Part of this decrease was offset by an increase in the reporting of train accidents involving track motorcars and roadway machines not equipped with AAR couplers. Under previous reporting requirements, with few exceptions, unless such equipment was operated under train rules and was subject to the protection afforded trains, collisions and derailments involving such equipment were not reportable train accidents. This has been changed in the revised regulation.

2. Rail-Highway Grade Crossing Accidents/Incidents. The revised regulation requires the reporting of any impact between railroad on-track equipment and an automobile, bus, truck, motorcycle, bicycle, farm vehicle or pedestrian at a rail-highway grade crossing. Previous regulations required the reporting of such an impact only if it resulted in a reportable casualty or in a minimum of \$750 in damages to railroad equipment, track, or roadbed.

3. 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.

4. Occupational Illness. This is a completely new category with no counterpart in previous casualty statistics. In this publication, nonfatal illnesses are included in the injury data.

5. Occupational Injuries. Major changes were made in the definition of a reportable injury. 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 all of his or her normally assigned duties for more than 24 hours in the aggregate during ten days immediately following the injury. This resulted in the reporting of only those injuries causing at least two 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 workday, the administration of medical treatment beyond first aid, transfer to another job, termination of employment, or lost consciousness. In addition, the case remains active for 365 days rather than the ten day period previously specified. An injury to a person other than an employee-on-duty was formerly reportable if it prevented the injured person from following his or her customary vocation or mode of life for more than 24 hours in the aggregate during the ten days immediately following the injury. Such an injury is presently reportable if the injured person requires medical treatment beyond first aid.

The overall effect of these changes has been a substantial increase in the number of accidents/incidents, and to a lesser degree, in the number of casualties reported. Due to the fact that 1975 was the initial year of a completely new reporting system it is felt that 1975 figures may be somewhat understated.

In reference to the tables shown in this report, it should be noted that only Tables A, B, 1, 20A and 21 pertain to rail-highway grade crossing accidents/incidents of all kinds. All of the other tables pertaining to accidents/incidents cover only those situations where motor vehicles were involved. The source of data used in Tables 23 through 28 is the National Rail-Highway Crossing Inventory as of October 1, 1977.

More detailed information on the National Inventory is available in the DOT publication "Summary Statistics of the National Railroad - Highway Crossing Inventory for Public At-Grade Crossings," report number FRA-OPPD-77-8. This publication can be obtained from the National Technical Information Service, Springfield, Virginia 22161, Accession Number PB 271334/AS.

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TABLE A SUMMARY OF ALL RAIL-HIGHWAY CROSSING ACCIDENTS FOR 11-YEAR PERIOD 1966 THRU 1976

Year	Number of Accidents	.....Total.....			Casualties per Accident
		Killed	Injured	Casualties	
1966	4,097	1,780	4,043	5,823	1.42
1967	3,932	1,632	3,812	5,444	1.38
1968	3,816	1,546	3,774	5,320	1.39
1969	3,774	1,490	3,669	5,159	1.37
1970	3,559	1,440	3,336	4,776	1.34
1971	3,392	1,356	3,332	4,688	1.38
1972	3,379	1,260	3,285	4,545	1.35
1973	3,379	1,185	3,283	4,468	1.32
1974	3,268	1,220	3,249	4,469	1.37
1975 ¹	11,354	978	4,168	5,146	0.45
1976	12,114	1,168	4,887	6,055	0.50

TABLE B NUMBER OF RAIL-HIGHWAY ACCIDENTS INVOLVING MOTOR VEHICLES FOR 11-YEAR PERIOD 1966 THRU 1976

Year	Number of Accidents	Motor Vehicles Registered (000) ²	Accidents per Million Vehicles
1966	3,862	80,084	48.22
1967	3,733	82,411	45.30
1968	3,603	85,799	41.99
1969	3,572	88,815	40.22
1970	3,377	92,124	36.66
1971	3,224	96,097	33.55
1972	3,222	100,595	32.03
1973	3,174	129,511	24.51
1974	3,079	135,720	22.69
1975 ¹	10,925	137,918	79.21
1976	11,700	142,583	82.06

(1) Due to changes in reporting requirements effective January 1, 1975, data collected after this time are not directly comparable to that of prior years. Please refer to introduction for discussion of changes.

(2) Estimated figures supplied by Federal Highway Administration

TABLE 1 RAIL-HIGHWAY ACCIDENTS/INCIDENTS OF ALL KINDS AND CASUALTIES
1976

Trains striking or being struck by:	Total accidents		Total Killed		Total Injured	
	#	Pct.	#	Pct.	#	Pct.
Pedestrians	91	0.8	52	4.5	37	0.8
Autcmobiles	8,621	71.2	770	65.9	3,221	65.9
Buses	36	0.3	9	0.8	46	0.9
Trucks	2,971	24.5	227	19.4	1,111	22.7
Motorcycles	72	0.6	22	1.9	36	0.7
Miscellaneous	323	2.7	40	3.4	154	3.2
Unknown	---	0.0	48	4.1	282	5.8
Total.....	12,114	100.0	1,168	100.0	4,887	100.0

TABLE 2-A NATURE OF ACCIDENTS/INCIDENTS AT RAIL-HIGHWAY CROSSINGS
INVOLVING MOTOR VEHICLES, SHOWING NUMBER OF ACCIDENTS, 1976

	Accidents		Killed		Injured	
	#	Pct.	#	Pct.	#	Pct.
Motor vehicle struck by train	8,352	71.3	846	82.2	2,941	66.6
Motor vehicle ran into train	3,348	28.6	182	17.7	1,473	33.3
Total.....	11,700	100.0	1,028	100.0	4,414	100.0

TABLE 2-B NATURE OF ACCIDENTS/INCIDENTS AT RAIL-HIGHWAY CROSSINGS,
WHERE MOTOR VEHICLE WAS STRUCK BY TRAIN, 1976

Type of Vehicle	.....Daylight.....			.....Dark.....		
	Accidents	Killed	Injured	Accidents	Killed	Injured
Passenger automobiles	3,729	433	1,314	2,390	209	846
Motor buses	24	9	41	5	0	4
Motor trucks	1,716	141	589	469	46	142
Motorcycles	15	7	4	4	1	1
Total.....	5,484	590	1,948	2,868	256	993

TABLE 2-C NATURE OF ACCIDENTS/INCIDENTS AT RAIL-HIGHWAY CROSSINGS
WHERE TRAIN WAS RUN INTO BY MOTOR VEHICLE, 1976

Type of Vehicle	.....Daylight.....			.....Dark.....		
	Accidents	Killed	Injured	Accidents	Killed	Injured
Passenger automobiles	1,087	66	405	1,415	62	656
Motor buses	4	0	1	3	0	0
Motor trucks	513	23	244	273	17	136
Motorcycles	33	11	14	20	3	17
Total.....	1,637	100	664	1,711	82	809

TABLE 3 RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES
THAT RAN INTO TRAINS, 1976

.....Circumstance.....	.....Part of train struck.....									
	Consist struck hwy user	Consist struck by hwy user	Loco(s)	First quarter	Second quarter	Third quarter	Fourth quarter	Unknown	Daylight	Dark
Train (units pulling)	6,892	2,410	1,848	208	116	94	144	0	5,786	3,516
Train (units pushing)	562	256	119	16	19	13	89	0	426	392
Train (standing)	0	149	41	34	25	21	28	0	20	129
Cars (moving)	86	93	29	29	8	8	19	0	107	72
Cars (standing)	0	28	6	5	4	6	7	0	4	24
Light Locos (moving)	663	296	288	2	2	3	1	0	561	398
Light Lccos (standing)	0	31	30	0	0	0	1	0	11	20
Other	149	85	20	1	4	1	59	0	206	28
Total.....	8,352	3,348	2,381	295	178	146	348	0	7,121	4,579

TABLE 4 NATURE OF ACCIDENTS/INCIDENTS AT RAIL-HIGHWAY CROSSINGS INVOLVING MOTOR VEHICLES AND PART OF 24-HOUR PERIOD, 1976

	Accidents		Struck by train		Ran into train	
	#	Pct.	Killed	Injured	Killed	Injured
Dawn	310	2.6	19	85	3	21
Day	6,811	58.2	571	1,863	97	643
Dusk	375	3.2	32	101	4	41
Dark	4,204	35.9	224	892	78	768
Total	11,700	100.0	846	2,941	182	1,473

TABLE 5 RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES ACCORDING TO HOUR, 1976

Hour	Total Accidents	Struck by Train	Ran into Train
Midnight to 12:59 AM	387	229	158
1 to 1:59 AM	376	186	190
2 to 2:59 AM	304	148	156
3 to 3:59 AM	209	116	93
4 to 4:59 AM	126	67	59
5 to 5:59 AM	177	110	67
6 to 6:59 AM	332	250	82
7 to 7:59 AM	503	402	101
8 to 8:59 AM	523	401	122
9 to 9:59 AM	535	409	126
10 to 10:59 AM	595	450	145
11 to 11:59 AM	607	479	128
12 Noon to 12:59 PM	655	503	152
1 to 1:59 PM	622	475	147
2 to 2:59 PM	665	514	151
3 to 3:59 PM	706	554	152
4 to 4:59 PM	732	565	167
5 to 5:59 PM	637	468	169
6 to 6:59 PM	594	421	173
7 to 7:59 PM	517	366	151
8 to 8:59 PM	425	285	140
9 to 9:59 PM	519	345	174
10 to 10:59 PM	472	311	161
11 to 11:59 PM	462	285	177
Unknown	20	13	7
TOTAL.....	11,700	8,352	3,348

TABLE 6 RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES
BY DAY OF WEEK, 1976

	Total Accidents	Struck by Train	Ran into Train
SUNDAY	1,005	742	263
MONDAY	1,716	1,262	454
TUESDAY	1,700	1,235	465
WEDNESDAY	1,812	1,262	550
THURSDAY	1,855	1,292	563
FRIDAY	2,018	1,440	578
SATURDAY	1,594	1,119	475
TOTAL	11,700	8,352	3,348

TABLE 7 RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES
BY MONTH, 1976

Month	Total Accidents	Struck by Train	Ran into Train
January	1,231	836	395
February	951	679	272
March	938	673	265
April	820	591	229
May	870	643	227
June	800	590	210
July	807	584	223
August	869	648	221
September	879	613	266
October	1,072	767	305
November	1,135	832	303
December	1,328	896	432
Unknown	---	---	---
Total	11,700	8,352	3,348

TABLE 8 TYPES OF MOTOR VEHICLES INVOLVED IN ACCIDENTS/INCIDENTS
AT RAIL-HIGHWAY CROSSINGS, 1976

Type of Vehicle	Number of Accidents	Vehicles Registered (COO)*	Accidents per million Vehicles	Number occurring in	
				Daylight	Dark
Passenger automobiles	8,621	109,861	78.4	4,816	3,805
Motor buses	36	486	74.0	28	8
Motor trucks	2,971	27,126	109.5	2,229	742
Motorcycles	72	5,110	14.0	48	24
TOTAL	11,700	142,583	82.0	7,121	4,579

*NOTE: Estimated figures supplied by Federal Highway Administration

TABLE 9-A RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES
BY HIGHEST CROSSING PROTECTION AND MOTORIST ACTION, 1976

Highest Protection Level	.....Motorist Action.....					Total
	Drove Around or Thru Gate	Stopped and Then Proceeded	Did Not Stop	Other	Unknown	
Gates	483	46	149	220	74	972
Cantilever Flashing Light	---	50	298	84	15	447
Standard Flashing Light	---	290	2,265	734	75	3,364
Wig Wags	---	25	196	59	30	310
Hwy. Traffic Signals	---	31	111	43	53	238
Audible	---	7	73	25	4	109
Crossbucks	---	356	3,713	1,190	374	5,633
Stop Signs	---	28	117	49	33	227
Watchman	---	1	8	4	---	13
Flagged by crew	---	12	76	13	5	106
Other	---	---	38	15	8	61
None	---	25	101	68	25	219
Unknown	---	---	1	---	---	1
TOTAL...	483	871	7,146	2,504	696	11,700

TABLE 9-B RAIL-HIGHWAY CASUALTIES INVOLVING MOTOR VEHICLES
BY HIGHEST CROSSING PROTECTION AND MOTORIST ACTION, 1976

Highest Protection Level	.....Motorist Action.....									
	Drove Around or Thru Gate		Stopped and Then Proceeded		Did Not Stop		Other		Total	
	kld	inj	kld	inj	kld	inj	kld	inj	kld	inj
Gates	57	170	---	6	8	49	10	49	75	274
Cantilever Flashing Light	---	2	4	16	33	160	3	16	40	194
Standard Flashing Light	4	8	13	90	231	972	32	162	260	1,232
Wig Wags	---	---	1	9	27	77	4	20	32	106
Hwy. Traffic Signals	---	---	5	11	11	55	4	26	20	92
Audible	---	---	---	2	6	27	1	5	7	34
Crossbucks	---	2	28	127	431	1,758	76	437	535	2,324
Stop Signs	---	---	---	2	8	54	10	27	18	83
Watchman	---	---	---	---	---	2	---	---	---	2
Flagged by crew	---	---	---	4	---	13	---	3	---	20
Other	---	---	---	---	8	10	---	3	8	13
Ncne	---	---	1	5	6	28	6	7	13	40
Unknown	---	---	---	---	---	---	---	---	---	---
TOTAL...	61	182	52	272	769	3,205	146	755	1,028	4,414

TABLE 10 RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES
BY TYPE OF CROSSING PROTECTION, 1976

Crossing Protection	Killed	Injured	Number Of Accidents	Of Crossings	Devices Operating		not reported	Struck		Ran	
					Yes	No		by train..... Daylight	Dark	into train.... Daylight	Dark
Gates	75	274	929	12,333	883	34	12	349	370	62	148
Flashing lights	320	1,426	3,842	34,121	3,737	66	39	1,783	931	563	565
Hwy Sgnl WW Bells	59	232	663	3,344	518	26	119	322	142	102	97
Crossbucks	534	2,323	5,639	141,053	N/A	N/A	N/A	2,722	1,267	636	814
Stop signs	18	83	227	3,535	N/A	N/A	N/A	123	54	27	23
Other passive	8	35	180	9,441	N/A	N/A	N/A	65	43	26	46
Ncne	14	41	220	15,225	N/A	N/A	N/A	120	61	21	18
Total	1,028	4,414	11,700	219,052	5,844	548	5,308	5,484	2,868	1,637	1,711

NOTE: HWY SIGNL - Highway traffic signals
WW - Wigwags

TABLE 11 RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES
ACCORDING TO LOCATION OF CROSSING PROTECTION, 1976

Crossing protection	Number of Accidents	Occurring		Struck		Ran	
		Daylight	Dark	.....by train..... Daylight	Dark	.....into train.... Daylight	Dark
Automatic, both sides	5,170	3,015	2,155	2,333	1,384	682	771
Automatic, side of approach	195	120	75	86	44	34	31
Automatic, opposite side	59	41	18	32	10	9	8
Automatic, side not reported	10	5	5	3	5	2	---
Manual, both sides	43	14	29	9	13	5	16
Manual, side of approach	28	15	13	12	6	3	7
Manual, opposite side	9	4	5	4	3	---	2
Manual, side not reported	39	24	15	19	6	5	9
Other, both sides	5,074	3,193	1,881	2,432	1,138	761	743
Other, side of approach	520	333	187	262	118	71	69
Other, opposite side	276	185	91	151	63	34	28
Other, side not reported	57	31	26	21	17	10	9
None	219	140	79	119	61	21	18
Not reported	1	1	---	1	---	---	---
Total	11,700	7,121	4,579	5,484	2,868	1,637	1,711

TABLE 12 CROSSING ACCIDENTS/INCIDENTS DURING DUSK AND DARK HOURS INVOLVING MOTOR VEHICLES
ACCORDING TO ILLUMINATION OF CROSSING, 1976

Crossing Illumination	Number of Accidents	Struck by Train	Ran into Train	....Persons....	
				Killed	Injured
Lighted	1,748	1,086	662	120	687
Not-lighted	1,753	1,130	623	151	695
Not reported	1,078	652	426	67	420
Total	4,579	2,868	1,711	338	1,802

TABLE 13 RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES
ACCORDING TO SPEED AND TYPE OF TRAIN INVOLVED, 1976

Train Speed (MPH)	Total	Struck By Train		Ran Into Train		Freight		Passenger		Yard (Switching) And Other	
		Daylight	Dark	Daylight	Dark	#	PCT.	#	PCT.	#	PCT.
Unknown	218	30	12	42	134	133	1.6	1	0.2	84	2.7
C-9	3,793	1,463	966	546	818	1,634	20.1	28	7.0	2,131	66.9
1C-19	2,428	1,113	621	331	363	1,738	21.5	46	11.4	644	20.2
2C-29	2,098	1,103	490	316	189	1,858	22.9	64	15.9	176	5.5
3C-39	1,511	815	374	202	120	1,356	16.8	59	14.6	96	3.0
4C-49	1,026	592	242	128	64	945	11.7	44	10.9	37	1.2
5C-59	433	257	106	53	17	372	4.6	45	11.2	16	0.5
6C-69	127	70	43	11	3	67	0.8	58	14.4	2	0.0
7C-79	59	37	12	8	2	6	0.0	53	13.2	---	0.0
8C-89	6	4	1	---	1	1	0.0	5	1.2	---	0.0
90 and over	1	---	1	---	---	1	0.0	---	0.0	---	0.0
TOTAL...	11,700	5,484	2,868	1,637	1,711	8,111	100.0	403	100.0	3,186	100.0

TABLE 14 RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES
ACCORDING TO WEATHER CONDITIONS, 1976

Weather	Total Accidents		Struck By Train		Ran into Train	
	#	PCT.	Daylight	Dark	Daylight	Dark
Clear	8,034	68.6	3,982	1,834	1,121	1,097
Cloudy	2,276	19.4	1,044	612	311	309
Rain	893	7.6	304	286	127	176
Fog	127	1.0	43	30	15	39
Sleet	14	0.1	5	3	5	1
Snow	334	2.8	99	97	56	82
Not Reported	22	0.1	7	6	2	7
Total	11,700	100.0	5,484	2,868	1,637	1,711

TABLE 15 RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES
 ACCORDING TO NUMBER OF CARS IN TRAIN AND KIND OF TRAIN, 1976

Number of cars in train	Freight		Passenger		Yard (Switching) and others		Total		Number ...occurring in....	
	#	PCT.	#	PCT.	#	PCT.	#	PCT.	Daylight	Dark
Not reported/all locos	57	0.7	2	0.5	191	6.0	250	2.1	166	84
Ncne	138	1.7	25	6.2	886	27.8	1,049	9.0	615	434
1-9	1,587	19.6	219	54.3	1,342	42.2	3,148	26.9	2,082	1,066
10-19	881	10.9	122	30.3	408	12.8	1,411	12.0	920	491
20-29	603	7.4	9	2.2	134	4.2	746	6.3	465	281
30-39	553	6.8	3	0.7	81	2.5	637	5.4	377	260
40-49	538	6.6	7	1.7	52	1.6	597	5.1	342	255
50-59	576	7.1	5	1.2	26	0.8	607	5.1	320	287
60-69	583	7.2	2	0.5	16	0.5	601	5.1	326	275
70-79	455	5.6	2	0.5	9	0.3	466	3.9	262	204
80-89	557	6.9	3	0.7	12	0.4	572	4.8	331	241
90-99	472	5.8	---	0.0	8	0.3	480	4.1	280	200
100-109	397	4.8	---	0.0	6	0.2	403	3.4	217	186
110-119	243	3.0	1	0.3	5	0.2	249	2.1	130	119
120-129	184	2.3	1	0.3	5	0.2	190	1.6	110	80
130-139	111	1.4	---	0.0	1	0.0	112	0.9	65	47
140-149	80	1.0	1	0.3	1	0.0	82	0.7	52	30
150 and over	96	1.2	1	0.3	3	0.0	100	0.8	61	39
Total	8,111	100.0	403	100.0	3,186	100.0	11,700	100.0	7,121	4,579

TABLE 16 RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES
 ACCORDING TO SPEED OF MOTOR VEHICLE, 1976

Speed of Vehicle	.....Total Accidents.....				Struck by Train						Ran into Train					
	#	Pct.	Kld.	Inj.	.....Daylight.....		.....Dark.....		.....Daylight.....		.....Dark.....					
				#	Kld.	Inj.	#	Kld.	Inj.	#	Kld.	Inj.	#	Kld.	Inj.	
Unknwn	1,653	14.1	151	728	573	62	235	329	51	148	321	18	137	430	20	208
Standing	2,693	23.0	110	511	1,758	78	400	935	32	111	---	---	---	---	---	---
1 - 9	2,073	17.7	132	625	1,033	98	363	441	23	151	320	8	54	279	3	57
10 - 19	2,315	19.7	211	933	1,073	136	417	558	59	269	363	10	117	321	6	130
20 - 29	1,390	11.8	136	662	563	83	286	313	22	153	247	26	86	267	5	137
30 - 39	846	7.2	100	487	276	57	155	184	27	90	183	11	112	203	5	130
40 - 49	439	3.7	75	286	138	39	61	64	18	48	118	4	94	119	14	83
50 - 59	229	1.9	56	139	60	35	25	37	22	16	62	18	44	70	21	54
60 And over	62	0.5	17	43	10	2	6	7	2	7	23	5	20	22	8	10
Total	11,700	100.0	1,028	4,414	5,484	590	1,948	2,868	256	993	1,637	100	664	1,711	82	809

TABLE 17-A RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES
BY STATE, 1976

State	Accidents		Killed		Injured	
	#	Pct.	#	Pct.	#	Pct.
Alakama	365	3.1	37	3.5	126	2.8
Alaska	8	0.0	---	0.0	---	0.0
Arizona	57	0.4	3	0.2	18	0.4
Arkansas	223	1.9	28	2.7	111	2.5
California	596	5.0	55	5.3	173	3.9
Colcrado	148	1.2	18	1.7	38	0.8
Connecticut	19	0.1	---	0.0	2	0.0
Delaware	5	0.0	2	0.1	2	0.0
District of Columbia	1	0.0	---	0.0	3	0.0
Florida	349	2.9	75	7.2	172	3.8
Georgia	373	3.1	24	2.3	141	3.1
Hawaii	---	0.0	---	0.0	---	0.0
Idaho	101	0.8	8	0.7	32	0.7
Illinois	867	7.4	98	9.5	348	7.8
Indiana	671	5.7	77	7.4	273	6.1
Iowa	341	2.9	27	2.6	124	2.8
Kansas	218	1.8	37	3.5	113	2.5
Kentucky	279	2.3	23	2.2	95	2.1
Louisiana	387	3.3	21	2.0	146	3.3
Maine	33	0.2	---	0.0	3	0.0
Maryland	47	0.4	3	0.2	15	0.3
Massachusetts	39	0.3	1	0.0	18	0.4
Michigan	583	4.9	29	2.8	190	4.3
Minnesota	281	2.4	15	1.4	108	2.4
Mississippi	274	2.3	25	2.4	106	2.4
Misscurei	277	2.3	40	3.8	114	2.5
Montana	45	0.3	5	0.4	13	0.2
Nebraska	164	1.4	36	3.5	58	1.3
Nevada	14	0.1	---	0.0	7	0.1
New Hampshire	8	0.0	---	0.0	4	0.0
New Jersey	67	0.5	1	0.0	24	0.5
New Mexico	34	0.2	9	0.8	15	0.3
New York	135	1.1	8	0.7	56	1.2
North Carolina	334	2.8	22	2.1	105	2.3
North Dakota	84	0.7	11	1.0	25	0.5
Chic	792	6.7	64	6.2	303	6.8
Oklahoma	245	2.0	27	2.6	101	2.2
Oregon	185	1.5	18	1.7	88	1.9
Pennsylvania	296	2.5	22	2.1	94	2.1
Rhode Island	2	0.0	---	0.0	---	0.0
South Carolina	226	1.9	13	1.2	101	2.2
South Dakota	55	0.4	---	0.0	9	0.2
Tennessee	258	2.2	21	2.0	77	1.7
Texas	1,126	9.6	61	5.9	466	10.5
Utah	83	0.7	8	0.7	33	0.7
Vermont	11	0.0	---	0.0	---	0.0
Virginia	154	1.3	14	1.3	92	2.0
Washington	246	2.1	9	0.8	75	1.6
West Virginia	150	1.2	11	1.0	55	1.2
Wisconsin	413	3.5	19	1.8	132	2.9
Wycming	31	0.2	3	0.2	10	0.2
Unknown	---	0.0	---	0.0	---	0.0
Total.....	11,700	100.0	1,028	100.0	4,414	100.0

TABLE 17-B NATURE OF ACCIDENTS/INCIDENTS AT RAIL-HIGHWAY CROSSINGS INVOLVING MOTOR VEHICLES BY STATE, 1976

State	.....Daylight.....			.....Dark.....		
	Accidents	Killed	Injured	Accidents	Killed	Injured
Alabama	246	26	90	119	11	36
Alaska	4	---	---	4	---	---
Arizona	35	3	14	22	---	4
Arkansas	148	21	69	75	7	42
California	322	22	81	274	33	92
Colorado	91	12	19	57	6	19
Connecticut	9	---	2	10	---	---
Delaware	3	---	---	2	2	2
District of Columbia	1	---	3	---	---	---
Florida	264	71	142	85	4	30
Georgia	242	18	104	131	6	37
Hawaii	---	---	---	---	---	---
Idaho	66	7	14	35	1	18
Illinois	469	60	184	398	38	164
Indiana	398	49	148	273	28	125
Iowa	172	17	53	169	10	71
Kansas	141	24	64	77	13	49
Kentucky	178	16	55	101	7	40
Louisiana	243	18	94	144	3	52
Maine	21	---	2	12	---	1
Maryland	23	---	8	24	3	7
Massachusetts	18	---	6	21	1	12
Michigan	339	17	81	244	12	109
Minnesota	178	9	58	103	6	50
Mississippi	184	22	60	90	3	46
Missouri	180	31	90	97	9	24
Montana	26	3	10	19	2	3
Nebraska	108	28	46	56	8	12
Nevada	10	---	2	4	---	5
New Hampshire	6	---	3	2	---	1
New Jersey	41	1	13	26	---	11
New Mexico	21	6	8	13	3	7
New York	83	8	32	52	---	24
North Carolina	227	12	64	107	10	41
North Dakota	45	7	9	39	4	16
Ohio	413	36	146	379	28	157
Oklahoma	151	22	62	94	5	39
Oregon	103	6	53	82	12	35
Pennsylvania	168	16	53	128	6	41
Rhode Island	2	---	---	---	---	---
South Carolina	147	10	62	79	3	39
South Dakota	34	---	5	21	---	4
Tennessee	171	15	59	87	6	18
Texas	699	40	292	427	21	174
Utah	54	5	20	29	3	13
Vermont	8	---	---	3	---	---
Virginia	103	11	62	51	3	30
Washington	156	4	46	90	5	29
West Virginia	72	5	34	78	6	21
Wisconsin	277	10	82	136	9	50
Wyoming	21	2	8	10	1	2
Unknwn	---	---	---	---	---	---
Total.....	7,121	690	2,612	4,579	338	1,802

TABLE 18 RAIL-HIGHWAY ACCIDENTS/INCIDENTS BY STATE AND TYPE OF MOTOR VEHICLE INVOLVED, 1976

State	.....Total.....			....Automobiles....			.....Buses.....			....Motortrucks....			....Motorcycles....		
	#	kld	inj	#	kld	inj	#	kld	inj	#	kld	inj	#	kld	inj
Alabama	365	37	126	256	26	98	2	---	---	102	10	27	5	1	1
Alaska	8	---	---	7	---	---	---	---	---	1	---	---	---	---	---
Arizona	57	3	18	40	3	15	---	---	---	17	---	3	---	---	---
Arkansas	223	28	111	146	25	82	2	---	---	74	3	29	1	---	---
California	596	55	173	438	42	135	1	---	4	148	12	30	9	1	4
Colorado	148	18	36	101	12	26	---	---	---	46	5	12	1	1	---
Connecticut	19	---	2	16	---	2	---	---	---	3	---	---	---	---	---
Delaware	5	2	2	4	2	2	---	---	---	1	---	---	---	---	---
District of Columbia	1	---	3	---	---	---	---	---	---	1	---	3	---	---	---
Florida	349	75	172	239	60	109	2	---	22	101	11	37	7	4	4
Georgia	373	24	141	275	19	103	---	---	---	95	4	37	3	1	1
Hawaii	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
Idaho	101	8	32	59	7	21	---	---	---	42	1	11	---	---	---
Illinois	867	98	348	694	70	268	1	---	---	166	27	75	6	1	5
Indiana	671	77	273	529	56	217	1	---	---	137	20	53	4	1	3
Iowa	341	27	124	247	25	93	---	---	---	91	2	28	3	---	3
Kansas	218	37	113	149	23	85	---	---	---	67	13	28	2	1	---
Kentucky	279	23	95	203	19	64	1	---	4	74	4	26	1	---	1
Louisiana	387	21	146	297	16	111	2	---	5	88	5	30	---	---	---
Maine	33	---	3	23	---	1	---	---	---	9	---	1	1	---	1
Maryland	47	3	15	33	3	11	1	---	---	13	---	4	---	---	---
Massachusetts	39	1	18	35	1	15	1	---	---	3	---	3	---	---	---
Michigan	583	29	190	473	23	151	---	---	---	107	6	36	3	---	3
Minnesota	281	15	108	198	7	84	1	---	---	81	8	24	1	---	---
Mississippi	274	25	106	189	16	76	1	---	---	82	8	29	2	1	1
Missouri	277	40	114	200	35	78	2	---	---	73	5	36	2	---	---
Montana	45	5	13	26	3	8	---	---	---	19	2	5	---	---	---
Nebraska	164	36	58	107	17	30	1	9	7	55	10	20	1	---	1
Nevada	14	---	7	10	---	7	---	---	---	4	---	---	---	---	---
New Hampshire	8	---	4	6	---	4	---	---	---	2	---	---	---	---	---
New Jersey	67	1	24	56	1	21	1	---	1	10	---	2	---	---	---
New Mexico	34	9	15	18	5	9	1	---	---	15	4	6	---	---	---
New York	135	8	56	100	3	46	1	---	---	32	3	10	2	2	---
North Carolina	334	22	105	246	18	68	3	---	---	82	4	36	1	---	1
North Dakota	84	11	25	60	9	17	---	---	---	24	2	8	---	---	---
Ohio	792	64	303	613	50	239	2	---	---	174	13	63	3	1	1
Oklahoma	245	27	101	178	18	76	1	---	---	64	9	24	2	---	1
Oregon	185	18	88	109	11	47	1	---	---	72	5	40	3	2	1
Pennsylvania	296	22	94	233	20	70	1	---	2	61	2	22	1	---	---
Rhode Island	2	---	---	2	---	---	---	---	---	---	---	---	---	---	---
South Carolina	226	13	101	169	11	77	1	---	---	55	1	24	1	1	---
South Dakota	55	---	9	34	---	4	---	---	---	21	---	5	---	---	---
Tennessee	258	21	77	199	16	58	---	---	---	58	5	18	1	---	1
Texas	1,126	61	466	814	50	299	---	---	---	309	10	166	3	1	1
Utah	83	8	33	49	4	19	1	---	---	33	4	14	---	---	---
Vermont	11	---	---	8	---	---	---	---	---	3	---	---	---	---	---
Virginia	154	14	92	108	11	63	---	---	---	46	3	29	---	---	---
Washington	246	9	75	157	8	53	2	---	1	87	1	21	---	---	---
West Virginia	150	11	55	116	10	42	---	---	---	34	1	13	---	---	---
Wisconsin	413	19	132	332	13	110	2	---	---	76	3	20	3	3	2
Wyoming	31	3	10	18	2	7	---	---	---	13	1	3	---	---	---
Unknwn	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
Total.....	11,700	1,028	4,414	8,621	770	3,221	36	9	46	2,971	227	1,111	72	22	36

TABLE 19 RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES
BY STATE AND MONTH, 1976

State	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sept	Oct	Nov	Dec	Total
Alabama	29	29	34	38	30	26	19	25	29	29	38	37	365
Alaska	2	3	1	1	1	---	---	---	---	---	---	---	8
Arizona	4	5	6	4	1	9	2	4	6	7	3	6	57
Arkansas	21	12	15	17	21	17	12	17	17	28	29	17	223
California	53	56	50	41	41	64	35	58	37	44	50	67	596
Colorado	14	7	16	9	14	20	6	11	11	17	12	11	148
Connecticut	---	2	3	1	1	---	---	1	1	4	2	4	19
Delaware	---	---	---	1	1	---	---	---	2	---	1	---	5
District of Columbia	---	---	---	---	---	---	---	---	---	---	---	---	1
Florida	39	29	23	33	32	20	27	31	26	28	33	28	349
Georgia	39	29	27	25	24	24	26	33	25	45	43	33	373
Hawaii	---	---	---	---	---	---	---	---	---	---	---	---	---
Idaho	7	6	11	4	6	8	8	7	9	10	8	17	101
Illinois	105	53	71	51	59	66	61	73	59	63	89	117	867
Indiana	63	52	43	45	71	46	44	55	45	58	71	78	671
Iowa	39	22	32	18	23	21	31	23	28	31	32	41	341
Kansas	23	15	15	15	13	17	14	22	18	25	13	28	218
Kentucky	24	23	24	24	17	14	16	24	27	28	24	34	279
Louisiana	37	24	19	34	37	26	32	31	29	30	50	38	387
Maine	7	3	5	1	---	---	3	2	1	3	3	5	33
Maryland	7	3	2	4	4	4	6	1	3	5	2	6	47
Massachusetts	1	1	5	3	3	---	3	---	3	4	4	12	39
Michigan	88	54	49	38	37	34	29	41	44	51	50	68	583
Minnesota	38	19	23	10	24	19	16	19	25	30	18	40	281
Mississippi	31	19	18	14	26	23	17	20	17	28	35	26	274
Missouri	16	28	29	18	18	19	19	20	20	22	30	38	277
Montana	3	3	7	2	2	4	1	5	3	7	5	3	45
Nebraska	12	18	12	18	12	11	7	14	10	16	20	14	164
Nevada	---	2	2	---	1	---	1	4	1	3	---	---	14
New Hampshire	---	---	---	1	---	---	2	1	---	1	1	2	8
New Jersey	14	9	5	8	4	5	3	3	2	7	3	4	67
New Mexico	2	2	1	1	4	3	4	4	2	3	2	6	34
New York	23	5	13	10	6	3	12	5	8	11	15	24	135
North Carolina	31	34	21	19	27	25	22	14	32	33	42	34	334
North Dakota	11	9	8	8	4	5	4	4	6	6	9	10	84
Ohio	85	73	62	45	57	49	69	46	63	87	73	83	792
Oklahoma	16	18	22	17	16	11	23	22	18	19	29	32	245
Oregon	14	20	14	14	9	13	10	20	14	18	14	25	185
Pennsylvania	39	23	30	28	16	14	18	15	25	22	28	38	296
Rhode Island	---	---	---	1	---	1	---	---	---	---	---	---	2
South Carolina	27	17	31	15	12	10	16	18	16	14	23	27	226
South Dakota	4	11	2	2	1	3	3	3	4	6	6	10	55
Tennessee	32	23	20	18	19	14	21	23	17	27	23	21	258
Texas	113	77	76	85	101	80	97	92	86	107	105	107	1126
Utah	10	14	6	6	5	3	5	5	3	8	9	9	83
Vermont	2	1	1	---	---	1	---	---	---	1	---	5	11
Virginia	16	15	13	15	8	6	5	5	11	19	21	20	154
Washington	15	19	17	17	26	22	24	19	28	13	22	24	246
West Virginia	14	11	13	13	6	11	10	10	13	19	14	16	150
Wisconsin	57	50	38	25	27	26	22	17	33	33	28	57	413
Wyoming	2	3	3	3	3	1	2	2	2	2	2	6	31
Unknwn	---	---	---	---	---	---	---	---	---	---	---	---	---
Total.....	1231	951	938	820	870	800	807	869	879	1072	1135	1328	11700

TABLE 20-A CASUALTIES IN ALL TYPES OF RAIL-HIGHWAY ACCIDENTS/INCIDENTS BY STATE, 1976

State	Accidents	Killed		Injured		Casualties	
		#	Pct.	#	Pct.	#	Pct.
Alabama	369	36	3.0	131	2.6	167	2.7
Alaska	13	---	0.0	---	0.0	---	0.0
Arizona	61	3	0.2	20	0.4	23	0.3
Arkansas	228	29	2.4	119	2.4	148	2.4
California	623	64	5.4	195	3.9	259	4.2
Colorado	150	19	1.6	42	0.8	61	1.0
Connecticut	20	1	0.0	14	0.2	15	0.2
Delaware	5	2	0.1	2	0.0	4	0.0
District of Columbia	1	---	0.0	3	0.0	3	0.0
Florida	361	81	6.9	184	3.7	265	4.3
Georgia	381	27	2.3	149	3.0	176	2.9
Hawaii	---	---	0.0	---	0.0	---	0.0
Idaho	107	12	1.0	37	0.7	49	0.8
Illinois	923	120	10.2	382	7.8	502	8.2
Indiana	688	82	7.0	283	5.7	365	6.0
Iowa	356	30	2.5	130	2.6	160	2.6
Kansas	225	39	3.3	117	2.3	156	2.5
Kentucky	291	27	2.3	106	2.1	133	2.1
Louisiana	397	23	1.9	170	3.4	193	3.1
Maine	35	---	0.0	6	0.1	6	0.0
Maryland	48	4	0.3	15	0.3	19	0.3
Massachusetts	41	2	0.1	21	0.4	23	0.3
Michigan	612	31	2.6	209	4.2	240	3.9
Minnesota	291	18	1.5	113	2.3	131	2.1
Mississippi	279	32	2.7	111	2.2	143	2.3
Missouri	294	49	4.1	158	3.2	207	3.4
Montana	45	6	0.5	14	0.2	20	0.3
Nebraska	176	38	3.2	63	1.2	101	1.6
Nevada	16	2	0.1	7	0.1	9	0.1
New Hampshire	8	---	0.0	6	0.1	6	0.0
New Jersey	69	3	0.2	24	0.4	27	0.4
New Mexico	37	10	0.8	17	0.3	27	0.4
New York	139	10	0.8	66	1.3	76	1.2
North Carolina	342	23	1.9	123	2.5	146	2.4
North Dakota	87	12	1.0	29	0.5	41	0.6
Ohio	814	70	5.9	316	6.4	386	6.3
Oklahoma	253	29	2.4	108	2.2	137	2.2
Oregon	195	21	1.7	92	1.8	113	1.8
Pennsylvania	302	26	2.2	106	2.1	132	2.1
Rhode Island	3	---	0.0	1	0.0	1	0.0
South Carolina	230	16	1.3	104	2.1	120	1.9
South Dakota	57	---	0.0	10	0.2	10	0.1
Tennessee	260	23	1.9	80	1.6	103	1.7
Texas	1,161	68	5.8	560	11.4	628	10.3
Utah	87	12	1.0	38	0.7	50	0.8
Vermont	11	---	0.0	---	0.0	---	0.0
Virginia	158	16	1.3	106	2.1	122	2.0
Washington	255	16	1.3	87	1.7	103	1.7
West Virginia	150	13	1.1	60	1.2	73	1.2
Wisconsin	428	20	1.7	142	2.9	162	2.6
Wyoming	32	3	0.2	11	0.2	14	0.2
Unknown	---	---	0.0	---	0.0	---	0.0
Total.....	12,114	1,168	100.0	4,887	100.0	6,055	100.0

TABLE 20-B CASUALTIES IN RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES
BY STATE AND NUMBER OF AUTOMOBILES REGISTERED, 1976

State	Total Accidents	Killed		Injured		Total #	Pct.	Vehicles Registered (000)*	Casualties per 10,000 Registrations		
		#	Pct.	#	Pct.				Killed	Injured	Total
Alabama	365	37	3.5	126	2.8	163	2.9	2,577	0.14	0.48	0.63
Alaska	8	---	0.0	---	0.0	---	0.0	251	0.00	0.00	0.00
Arizona	57	3	0.2	18	0.4	21	0.3	1,480	0.02	0.12	0.14
Arkansas	223	28	2.7	111	2.5	139	2.5	1,349	0.20	0.82	1.03
California	596	55	5.3	173	3.9	228	4.1	14,102	0.03	0.12	0.16
Colorado	148	18	1.7	38	0.8	56	1.0	2,027	0.08	0.18	0.27
Connecticut	19	---	0.0	2	0.0	2	0.0	2,009	0.00	0.00	0.00
Delaware	5	2	0.1	2	0.0	4	0.0	360	0.05	0.05	0.11
District of Columbia	1	---	0.0	3	0.0	3	0.0	266	0.00	0.11	0.11
Florida	349	75	7.2	172	3.8	247	4.5	5,603	0.13	0.30	0.44
Georgia	373	24	2.3	141	3.1	165	3.0	3,263	0.07	0.43	0.50
Hawaii	---	---	0.0	---	0.0	---	0.0	498	0.00	0.00	0.00
Idaho	101	8	0.7	32	0.7	40	0.7	681	0.11	0.46	0.58
Illinois	867	98	9.5	348	7.8	446	6.1	6,542	0.14	0.53	0.68
Indiana	671	77	7.4	273	6.1	350	6.4	3,455	0.22	0.79	1.01
Iowa	341	27	2.6	124	2.8	151	2.7	2,157	0.12	0.57	0.70
Kansas	218	37	3.5	113	2.5	150	2.7	1,848	0.20	0.61	0.81
Kentucky	279	23	2.2	95	2.1	118	2.1	2,350	0.09	0.40	0.50
Louisiana	387	21	2.0	146	3.3	167	3.0	2,343	0.08	0.62	0.71
Maine	33	---	0.0	3	0.0	3	0.0	699	0.00	0.04	0.04
Maryland	47	3	0.2	15	0.3	18	0.3	2,508	0.01	0.05	0.07
Massachusetts	39	1	0.0	18	0.4	19	0.3	3,192	0.00	0.05	0.05
Michigan	583	29	2.8	190	4.3	219	4.0	5,723	0.05	0.33	0.38
Minnesota	281	15	1.4	108	2.4	123	2.2	2,576	0.05	0.41	0.47
Mississippi	274	25	2.4	106	2.4	131	2.4	1,424	0.17	0.74	0.91
Missouri	277	40	3.6	114	2.5	154	2.8	2,942	0.13	0.38	0.52
Montana	45	5	0.4	13	0.2	18	0.3	639	0.07	0.20	0.28
Nebraska	164	36	3.5	58	1.3	94	1.7	1,218	0.29	0.47	0.77
Nevada	14	---	0.0	7	0.1	7	0.1	508	0.00	0.13	0.13
New Hampshire	8	---	0.0	4	0.0	4	0.0	504	0.00	0.07	0.07
New Jersey	67	1	0.0	24	0.5	25	0.4	4,312	0.00	0.05	0.05
New Mexico	34	9	0.8	15	0.3	24	0.4	863	0.10	0.17	0.27
New York	135	8	0.7	56	1.2	64	1.1	7,655	0.01	0.07	0.08
North Carolina	334	22	2.1	105	2.3	127	2.3	3,891	0.05	0.26	0.32
North Dakota	84	11	1.0	25	0.5	36	0.6	563	0.19	0.44	0.63
Ohio	792	64	6.2	303	6.8	367	6.7	7,469	0.08	0.40	0.49
Oklahoma	245	27	2.6	101	2.2	128	2.3	2,214	0.12	0.45	0.57
Oregon	185	18	1.7	68	1.9	106	1.9	1,791	0.10	0.49	0.59
Pennsylvania	296	22	2.1	94	2.1	116	2.1	7,979	0.02	0.11	0.14
Rhode Island	2	---	0.0	---	0.0	---	0.0	576	0.00	0.00	0.00
South Carolina	226	13	1.2	101	2.2	114	2.0	1,771	0.07	0.57	0.64
South Dakota	55	---	0.0	9	0.2	9	0.1	542	0.00	0.16	0.16
Tennessee	258	21	2.0	77	1.7	98	1.8	2,804	0.07	0.27	0.34
Texas	1,126	61	5.9	466	10.5	527	9.6	8,674	0.07	0.53	0.60
Utah	83	8	0.7	33	0.7	41	0.7	881	0.09	0.37	0.46
Vermont	11	---	0.0	---	0.0	---	0.0	294	0.00	0.00	0.00
Virginia	154	14	1.3	92	2.0	106	1.9	3,398	0.04	0.27	0.31
Washington	246	9	0.8	75	1.6	84	1.5	2,685	0.03	0.27	0.31
West Virginia	150	11	1.0	55	1.2	66	1.2	1,003	0.10	0.54	0.65
Wisconsin	413	19	1.8	132	2.9	151	2.7	2,653	0.07	0.49	0.56
Wyoming	31	3	0.2	10	0.2	13	0.2	361	0.08	0.27	0.36
Unknown	---	---	0.0	---	0.0	---	0.0	---	0.00	0.00	0.00
Total.....	11,700	1,028	100.0	4,414	100.0	5,442	100.0	137,473	0.07	0.32	0.39

*NOTE: Figures include passenger automobiles, trucks and buses
and are estimates supplied by the Federal Highway Administration.

TABLE 21 CASUALTIES IN ACCIDENTS/INCIDENTS AT RAIL-HIGHWAY CROSSINGS
BY CAUSE OF ACCIDENT, 1976

Cause	Accidents with Casualties	Total Persons		Total		Employees on duty				Employees not on duty		Non-trespassers		Trespassers			
		Killed	Injured	Killed	Injured	Trainsmen	Others	Killed	Injured	Killed	Injured	Killed	Injured	Killed	Injured		
TRAIN ACCIDENTS																	
Pedestrian struck by train	3	1	2	---	---	---	---	---	---	---	---	---	---	1	1	---	1
Motor vehicle struck by train	151	90	182	2	54	2	48	---	6	---	---	---	16	62	100	6	10
Other vehicle, machine, or animal struck by train	4	3	2	---	1	---	1	---	---	---	---	---	---	3	1	---	---
Pedestrian ran into train, pass over, through, or under cars	0	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
Motor vehicle ran into train	62	25	72	---	17	---	9	---	8	---	---	---	11	21	42	4	2
Other accident/incident at public rail-highway crossings	9	2	36	2	12	2	3	---	9	---	---	---	18	---	5	---	1
Total.....	229	121	294	4	84	4	61	---	23	---	---	---	47	107	149	10	14
TRAIN INCIDENTS																	
Pedestrian struck by train	74	46	29	---	1	---	1	---	---	---	---	---	---	21	16	25	12
Motor vehicle struck by train	2,734	821	3,109	1	56	1	45	---	11	---	1	---	10	780	2,928	39	114
Other vehicle, machine, or animal struck by train	30	11	23	---	2	---	2	---	---	---	---	---	---	6	17	3	4
Pedestrian ran into train, pass over, through, or under cars	18	7	11	---	1	---	1	---	---	---	---	---	---	4	5	3	5
Motor vehicle ran into train	724	90	900	---	13	---	12	---	1	---	---	---	---	88	843	2	44
Other accident/incident at public rail-highway crossings	50	3	55	---	9	---	3	---	6	---	---	---	---	3	44	---	2
Total.....	3,630	976	4,127	1	82	1	64	---	18	1	1	---	10	904	3,853	72	181
NON TRAIN																	
Pedestrian struck by train	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
Motor vehicle struck by train	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
Other vehicle, machine, or animal struck by train	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
Pedestrian ran into train, pass over, through, or under cars	1	1	---	---	---	---	---	---	---	---	---	---	---	---	---	1	---
Motor vehicle ran into train	336	68	426	---	12	---	10	---	2	---	---	---	---	66	399	2	15
Other accident/incident at public rail-highway crossings	30	---	40	---	17	---	6	---	11	---	---	---	---	1	21	---	1
Total.....	367	69	466	---	29	---	16	---	13	---	---	---	1	66	420	3	16
GRAND TOTAL																	
Pedestrian struck by train	77	47	31	---	1	---	1	---	---	---	---	---	---	22	17	25	13
Motor vehicle struck by train	2,885	911	3,291	3	110	3	93	---	17	---	1	---	28	862	3,028	45	124
Other vehicle, machine, or animal struck by train	34	14	25	---	3	---	3	---	---	---	---	---	---	11	16	3	4
Pedestrian ran into train, pass over, through, or under cars	19	8	11	---	1	---	1	---	---	---	---	---	---	4	5	4	5
Motor vehicle ran into train	1,122	183	1,398	---	42	---	31	---	11	---	---	---	---	11	175	1,284	8
Other accident/incident at public rail-highway crossings	89	5	131	2	38	2	31	---	11	---	---	---	---	19	3	70	4
Total.....	4,226	1,166	4,667	5	195	5	141	---	54	1	1	---	58	1,077	4,422	85	211

TABLE 22 RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES
BY KIND OF CROSSING PROTECTION IN 1976

Railroad	Gates	Flashing Lights	Hwy Signals Wigwags Bells	Cross- bucks	Stop Signs	Other Passive	None	Total

Class I RR (Line-Haul)								
Eastern District								
ANN ARBOR RAILROAD	1	---	---	1	2	---	---	4
BALTIMORE AND OHIO RAILROAD	9	104	17	169	6	3	1	309
BANGOR AND AROOSTOOK RAILROAD	1	1	1	4	---	---	---	7
BESSEMER AND LAKE ERIE RAILROAD	---	1	---	9	---	---	---	10
BCSTON AND MAINE CORPORATION	3	12	---	4	1	---	---	20
CENTRAL RAILROAD COMPANY OF NEW JERSEY	---	---	---	6	---	1	---	7
CENTRAL VERMONT	---	4	---	1	---	---	---	5
CHESAPEAKE AND OHIO RAILWAY COMPANY	29	134	3	164	2	1	5	338
CHICAGO AND EASTERN ILLINOIS	8	10	---	16	---	---	---	34
CHICAGO AND ILLINOIS MIDLAND RAILWAY	---	3	---	4	---	---	---	7
CONSOLIDATED RAIL CORP.	121	406	36	338	17	23	11	952
DELAWARE AND HUDSON RAILROAD	---	1	---	1	---	---	---	2
DETROIT AND TOLEDO SHORE LINE RAILROAD	---	1	---	2	---	---	---	3
DETROIT, TOLEDO AND IRONTON RAILROAD	2	2	---	14	1	---	1	20
ELGIN, JOLIET AND EASTERN RAILWAY	3	3	1	1	---	---	---	8
ERIE LACKAWANNA RAILROAD	8	12	4	18	---	1	1	44
GRAND TRUNK WESTERN	25	49	1	39	---	1	2	117
ILLINOIS TERMINAL RAILROAD	1	10	---	9	---	---	---	20
LEHIGH VALLEY	---	2	---	4	1	1	---	6
LONG ISLAND RAILROAD	10	1	---	1	---	---	---	12
MAINE CENTRAL RAILROAD	1	11	2	8	---	---	---	22
METRAK	30	68	5	85	2	4	3	197
NORFOLK AND WESTERN RAILWAY	42	192	13	269	---	5	5	546
PENN CENTRAL TRANSPORTATION COMPANY	45	144	8	143	3	2	2	347
PENNSYLVANIA-READING SEASHORE LINES	---	4	---	5	---	---	---	9
PITTSBURGH AND LAKE ERIE RAILROAD	1	---	1	5	---	---	---	7
READING COMPANY	3	8	---	9	---	---	---	20
RICHMOND, FREDERICKSBURG AND POTOMAC RR	---	1	---	---	---	---	---	1
WESTERN MARYLAND RAILWAY	1	19	1	10	---	---	---	31
SUBTOTAL, Eastern District	344	1,203	93	1,359	35	42	31	3,107
Southern District								
ALABAMA GREAT SOUTHERN RAILROAD	1	29	11	32	---	---	1	74
AUTOTRAIN CORPORATION	1	6	---	9	---	---	---	16
CENTRAL OF GEORGIA RAILROAD COMPANY	3	27	7	47	---	2	3	69
CINCINNATI, NEW ORLEANS & TEXAS PACIFIC	1	5	9	12	---	1	---	28
CLINCHFIELD RAILROAD	---	---	---	2	1	2	2	7
FLORIDA EAST COAST RAILWAY	12	21	---	11	---	1	---	45
GEORGIA RAILROAD	1	3	1	26	---	---	---	31
GEORGIA SOUTHERN & FLORIDA RAILWAY	2	1	6	13	1	---	---	23
ILLINOIS CENTRAL GULF RAILROAD	36	128	21	283	93	11	8	580
LOUISVILLE AND NASHVILLE RAILROAD	40	220	27	245	16	13	30	591
NORFOLK SOUTHERN RAILWAY	---	14	1	31	---	1	1	48
SEABOARD COAST LINE RAILROAD	35	185	3	495	2	3	4	727
SOUTHERN RAILWAY	12	145	29	303	---	10	19	518
SUBTOTAL, Southern District	144	784	115	1,509	113	44	66	2,777
Western District								
ATCHISON, TOPEKA AND SANTA FE RAILWAY	69	192	23	219	4	1	4	512
BURLINGTON NORTHERN	52	161	55	419	7	12	21	727
CHICAGO AND NORTHWESTERN	51	130	60	214	2	9	10	476
CHICAGO, MILWAUKEE, ST. PAUL AND PACIFIC	27	137	24	192	1	5	7	393
CHICAGO, ROCK ISLAND AND PACIFIC RAILROAD	22	76	16	121	---	1	3	239
COLORADO AND SOUTHERN RAILWAY	---	9	8	18	1	---	3	39
DENVER AND RIO GRANDE WESTERN RAILROAD	1	24	2	31	---	2	1	61
DULUTH, MISSABE AND IRON RANGE RAILWAY	1	---	2	4	1	---	---	8
DULUTH, WINNIPEG AND PACIFIC RAILWAY	---	---	1	6	---	---	---	7
FOOT MOUTH AND DENVER RAILWAY	1	21	1	39	---	---	2	64
KANSAS CITY SOUTHERN RAILWAY	1	34	8	44	---	1	7	95
MISSOURI-KANSAS-TEXAS RAILROAD	---	64	5	77	---	2	3	151
MISSOURI PACIFIC RAILROAD	20	229	6	311	2	21	12	601
NORTHWESTERN PACIFIC RAILROAD	---	4	1	3	3	---	---	11
ST. LOUIS-SAN FRANCISCO RAILWAY	16	109	4	190	2	7	2	330
ST. LOUIS SOUTHWESTERN RAILWAY COMPANY	7	35	10	47	2	1	4	106
SCOTLINE RAILROAD	10	85	6	84	---	2	---	187
SOUTHERN PACIFIC TRANSPORTATION COMPANY	107	165	161	270	27	7	12	749
TEXAS AND PACIFIC RAILWAY	1	39	1	39	---	---	2	62
TEXAS MEXICAN RAILWAY COMPANY	---	8	---	4	---	---	---	12
TOLEDO, PEORIA AND WESTERN RAILROAD	---	10	---	5	---	---	1	16
UNION PACIFIC RAILROAD	30	127	13	199	4	3	11	387
WESTERN PACIFIC	8	17	9	34	2	---	---	70
SUBTOTAL, Western District	424	1,676	416	2,570	58	74	105	5,323

TABLE 22 RAIL-HIGHWAY ACCIDENTS/INCIDENTS INVOLVING MOTOR VEHICLES
BY KIND OF CROSSING PROTECTION IN 1976

Cont. Railroad	Gates	Flashing Lights	Hwy Signals Wigwags Bells	Cross- bucks	Stop Signs	Other Passive	None	Total

Class I RR (Switching and Terminal)								
Eastern District								
ALTON AND SOUTHERN RAILROAD	4	6	---	1	---	---	---	11
BALTIMORE AND OHIO CHICAGO TERMINAL RR	5	6	---	4	---	---	---	15
BELT RAILWAY COMPANY OF CHICAGO	3	4	---	---	---	---	---	7
CUYAHOGA VALLEY RAILWAY COMPANY	---	---	4	---	---	---	---	4
INDIANA HARBOR BELT RAILROAD	14	15	---	2	---	1	3	35
INDIANAPOLIS UNION RAILWAY	---	2	1	---	---	---	---	3
LAKE TERMINAL RAILROAD COMPANY	---	---	---	1	---	1	1	3
PATAPSCO AND BACK RIVERS RAILROAD	---	---	---	1	---	---	---	1
PHILADELPHIA, BETHLEHEM AND NEW ENGLAND	---	---	---	---	---	1	---	1
FIVER TERMINAL RAILWAY	---	1	---	---	---	---	---	1
UNION RAILROAD "PENNA."	---	1	---	---	---	---	---	1
SUBTOTAL, Eastern District	26	35	5	9	---	3	4	82
Southern District								
BIRMINGHAM SOUTHERN RAILROAD	---	5	---	1	---	---	---	6
KENTUCKY AND INDIANA TERMINAL RAILROAD	---	8	---	1	---	---	---	9
SUBTOTAL, Southern District	---	13	---	2	---	---	---	15
Western District								
HOUSTON BELT AND TERMINAL RAILWAY	1	27	2	14	---	---	---	44
KANSAS CITY TERMINAL RAILWAY	---	1	---	3	---	---	---	4
PORTLAND TERMINAL (OREGON)	---	2	---	1	---	3	2	8
FORT TERMINAL RAILROAD ASSOCIATION	---	4	---	6	---	---	---	10
TERM. RAILROAD ASSOCIATION OF ST. LOUIS	7	8	---	5	---	---	---	20
TX PAC-MO PAC. TERM RR OF NEW ORLEANS	---	1	---	---	---	1	1	3
SUBTOTAL, Western District	8	43	2	29	---	4	3	89
SUBTOTAL, Class II Railroads	14	162	37	255	23	17	12	520
RECAPITULATION								
ALL DISTRICTS								
Class I RR (Line-Haul)	881	3,589	619	5,344	204	156	201	10,994
Class I RR (Switching and Terminal)	34	91	7	40	---	7	7	186
Class II Railroads	14	162	37	255	23	17	12	520
	929	3,842	663	5,639	227	180	220	11,700

NOTE: Amtrak and Autotrain accidents have been excluded in all other tables.
These accidents are reported by Amtrak or Autotrain and by the operating carrier.
In this table they are included in the detail lines but excluded in the recapitulation.

TABLE 23 CROSSINGS BY STATE AND TYPE

State	Public At Grade	Public Grade Separation	Private	Pedestrian	Total
Alabama	4,803	689	2,594	28	8,114
Alaska	224	10	74	---	308
Arizona	1,062	137	743	6	1,948
Arkansas	4,107	308	1,990	16	6,421
California	9,465	1,443	5,780	242	16,930
Colorado	2,346	291	1,499	10	4,146
Connecticut	548	601	507	56	1,712
Delaware	263	95	170	6	534
District of Columbia	70	68	16	13	167
Florida	5,904	295	2,470	80	8,749
Georgia	6,936	829	3,121	41	10,927
Hawaii	6	---	---	---	6
Idaho	2,211	164	1,862	7	4,244
Illinois	13,858	3,046	8,081	432	25,417
Indiana	10,137	1,207	4,195	135	15,674
Iowa	9,001	1,103	6,396	62	16,562
Kansas	9,725	591	4,935	34	15,285
Kentucky	3,695	950	3,773	104	8,522
Louisiana	5,011	340	4,432	57	9,840
Maine	1,120	206	1,068	13	2,407
Maryland	1,128	531	891	27	2,577
Massachusetts	1,230	1,254	602	99	3,185
Michigan	8,385	770	3,796	99	13,050
Minnesota	8,071	1,004	5,401	84	14,560
Mississippi	3,582	348	2,768	21	6,719
Missouri	6,640	1,201	5,009	105	12,955
Montana	2,292	273	3,373	22	5,960
Nebraska	5,636	422	4,106	25	10,189
Nevada	360	84	317	2	763
New Hampshire	718	247	566	19	1,550
New Jersey	2,215	1,295	780	128	4,418
New Mexico	847	143	611	4	1,605
New York	4,452	2,632	4,051	302	11,437
North Carolina	5,496	811	4,542	77	10,926
North Dakota	5,759	173	2,785	34	8,751
Ohio	9,968	2,492	6,028	113	18,601
Oklahoma	5,787	482	2,463	19	8,751
Oregon	2,944	465	3,406	91	6,906
Pennsylvania	6,744	3,725	4,238	339	15,046
Rhode Island	142	140	82	4	368
South Carolina	4,442	535	1,884	19	6,880
South Dakota	3,395	174	2,186	7	5,762
Tennessee	4,166	1,007	2,454	34	7,661
Texas	14,646	1,557	7,528	47	23,778
Utah	1,372	171	901	6	2,450
Vermont	595	162	799	51	1,607
Virginia	2,816	1,073	3,928	69	7,886
Washington	4,290	807	4,423	116	9,636
West Virginia	2,464	663	2,934	110	6,171
Wisconsin	7,333	871	4,823	180	13,207
Wyoming	620	129	955	6	1,710
Puerto Rico	55	---	2	---	57
Total.....	219,082	38,014	142,338	3,601	403,035

TABLE 24 CROSSINGS BY RAILROAD AND TYPE

Railroad	Public At Grade	Public Grade Separation	Private	Pedestrian	Total
LINE HAUL - EASTERN DISTRICT					
Akron, Canton and Youngstown	222	28	150	---	400
Baltimore and Ohio Railroad	5,508	1,524	3,765	134	10,931
Bangor and Aroostook Railroad	214	33	491	3	741
Bessemer and Lake Erie Railroad	166	86	105	2	359
Boston and Maine Corporation	1,253	766	713	62	2,794
Canadian Pacific Railway Company	108	27	164	41	340
Central Vermont	224	109	280	10	623
Chesapeake and Ohio Railway	4,609	650	4,198	143	9,600
Chicago and Eastern Illinois	538	59	291	3	891
Chicago and Illinois Midland Railway	116	7	75	---	198
Consolidated Rail Corporation	25,418	10,067	13,415	747	49,647
Delaware and Hudson Railroad	546	203	691	26	1,466
Detroit and Toledo Shore Line	75	12	17	---	104
Detroit, Toledo and Ironton	530	66	477	6	1,079
Elgin, Joliet and Eastern	250	60	102	---	412
Grand Trunk Western	1,335	235	670	13	2,253
Illinois Terminal Railroad	197	46	109	1	355
Long Island Railroad	313	388	82	85	868
Maine Central Railroad	663	114	469	8	1,254
Missouri-Illinois Railroad	166	20	160	1	367
Monongahela Railway	96	73	135	1	305
Amtrak	33	1	6	---	40
Norfolk and Western Railway	7,824	1,756	6,057	115	15,752
Pittsburg and Lake Erie Railroad	112	73	104	16	307
Richmond Fredericksburg Potomac	114	66	58	20	260
Western Maryland Railway	500	142	507	10	1,159
SUBTOTAL, EASTERN	51,130	16,815	33,311	1,451	102,707
LINE HAUL - SOUTHERN DISTRICT					
Alabama Great Southern Railroad	---	---	---	---	---
Autotrain Corporation	---	---	---	---	---
Atlanta and West Point Railroad	152	34	22	6	214
Central of Georgia Railroad	---	---	---	---	---
Cinn., N.O. & Texas Pacific	---	---	---	---	---
Clinchfield Railroad	144	115	232	4	495
Florida East Coast Railway	636	39	117	13	1,007
Georgia Railroad	407	64	126	4	601
Georgia Southern & Florida	---	---	---	---	---
Illinois Central Gulf Railroad	10,078	1,596	6,829	204	18,707
Louisville and Nashville	7,991	1,350	4,979	206	14,528
Norfolk Southern Railway	---	---	---	---	---
Seaboard Coast Line Railroad	11,881	1,084	5,730	132	18,827
Southern Railway	13,092	2,114	8,142	73	23,421
SUBTOTAL, SOUTHERN	44,563	6,396	26,177	644	77,800
LINE HAUL - WESTERN DISTRICT					
Atchison, Topeka and Santa Fe	11,952	1,271	7,150	89	20,462
Burlington Northern	20,673	2,271	16,136	293	39,373
Chicago and Northwestern	11,139	1,536	7,469	211	20,355
Chi., Milw., St. Paul & Pacific	9,293	1,235	6,881	135	17,544
Chicago, Rock Island & Pacific	6,972	938	4,048	28	11,986
Colorado and Southern Railway	422	60	302	3	787
Denver and Rio Grande Western	1,115	190	525	4	1,834
Duluth, Missabe and Iron Range	253	62	182	8	505
Duluth, Winnipeg and Pacific	99	27	30	---	156
Fort Worth and Denver Railway	936	54	456	---	1,448
Green Bay and Western Railroad	314	11	246	---	571
Kansas City Southern Railway	1,012	161	470	3	1,646
Lake Superior and Ishpeming	88	7	44	---	139
Minneapolis, Northfield and So.	122	44	9	1	176
Missouri-Kansas-Texas Railroad	2,214	284	1,214	7	3,719
Missouri Pacific Railroad	10,252	857	6,917	112	18,138
Northwestern Pacific Railroad	181	36	298	5	520
St. Louis-San Francisco Railway	5,550	514	2,868	42	8,994
St. Louis Southwestern Railway	1,424	101	509	---	2,034
Soc Line	4,365	306	2,765	45	7,481
Southern Pacific Trans. Company	11,829	1,600	8,027	237	21,693
Spcokane International Company	---	---	---	---	---
Texas and Pacific Railway	1,694	241	659	9	2,803
Texas Mexican Railway Company	214	9	205	---	428
Toledo, Peoria and Western	291	10	201	6	508
Union Pacific Railroad	7,642	848	6,316	49	15,057
Western Pacific	656	135	369	10	1,170
SUBTOTAL, WESTERN	110,904	12,808	74,518	1,297	199,527

TABLE 24 CROSSINGS BY RAILROAD AND TYPE

Cont. Railroad	Public At Grade	Public Grade Separation	Private	Pedestrian	Total
SWITCHING - EASTERN DISTRICT					
Aliquippa and Southern Railroad	---	3	---	---	3
Alton and Southern Railroad	26	5	27	---	58
East. and Ohio Chicago	150	114	36	7	309
Belt Railway Company of Chicago	38	70	79	1	188
Chicago, Union Station	1	13	---	---	14
Cocomaugh and Black Lick	6	4	7	---	17
Cuyahoga Valley Railway Company	---	---	---	---	---
Indiana Harbor Belt Railroad	112	74	50	6	242
Indianapolis Union Railway	45	36	---	---	81
Lakefront Dock and Railroad	---	---	---	---	---
Lake Terminal Railroad Company	2	---	6	1	9
Monongahela Connecting Railroad	---	2	---	1	3
Patapsco and Back Rivers	5	5	57	---	67
Phila., Bethlehem and New Eng.	---	8	16	---	24
Portland Terminal Company	89	16	11	---	116
River Terminal Railway	7	---	2	---	9
South Buffalo Railway	2	6	37	---	45
Union Railroad "Penna."	17	54	67	16	154
Washington Terminal	---	9	---	---	9
SUBTOTAL, EASTERN	500	419	397	32	1,348
SWITCHING - SOUTHERN DISTRICT					
Birmingham Southern Railroad	41	14	10	---	65
Kentucky and Indiana Terminal	75	19	12	---	106
SUBTOTAL, SOUTHERN	116	33	22	---	171
SWITCHING - WESTERN DISTRICT					
Houston Belt and Terminal Railway	282	29	47	5	363
Kansas City Terminal Railway	47	69	22	6	144
Garden Union Railway and Depot	---	---	---	---	---
Pecunia and Pekin Union Railway	36	5	9	---	50
Portland Terminal RR "Oregon"	98	7	29	2	136
Port Terminal RR Assoc.	58	10	85	1	154
Terminal Railroad Association	171	84	15	1	271
Texas Pacific-Missouri Pacific	---	---	---	---	---
SUBTOTAL, WESTERN	692	204	207	15	1,118
RECAPITULATION					
LINE HAUL - EASTERN DISTRICT	51,130	16,815	33,311	1,451	102,707
LINE HAUL - SOUTHERN DISTRICT	44,583	6,396	26,177	644	77,800
LINE HAUL - WESTERN DISTRICT	110,904	12,808	74,518	1,297	199,527
SWITCHING - EASTERN DISTRICT	500	419	397	32	1,348
SWITCHING - SOUTHERN DISTRICT	116	33	22	---	171
SWITCHING - WESTERN DISTRICT	692	204	207	15	1,118
TOTAL CLASS I - LINE HAUL	206,617	36,019	134,006	3,392	380,034
TOTAL CLASS I - SWITCHING	1,308	656	626	47	2,637
CLASS II RAILROADS	11,157	1,339	7,706	162	20,364
TOTAL:	219,082	38,014	142,338	3,601	403,035

TABLE 25-A PUBLIC AT GRADE CROSSINGS BY
TYPICAL DAILY TRAIN MOVEMENTS AND AVERAGE DAILY TRAFFIC
CROSSINGS WITH TRAIN ACTIVATED WARNING DEVICES

TRAFFIC	TRAIN MOVEMENTS						TOTAL
	0 TO 2	3 TO 5	6 TO 10	11 TO 20	21 TO 40	>40	
0 TO 250	1,496	1,070	1,800	1,719	1,236	347	7,668
251 TO 500	1,022	767	1,219	1,058	776	265	5,107
501 TO 1,000	1,596	1,076	1,579	1,542	1,062	333	7,188
1001 TO 5,000	4,872	2,814	3,709	3,629	2,496	864	18,384
5001 TO 10,000	1,827	579	1,335	1,348	857	369	6,715
MORE THAN 10,000	1,377	769	913	954	514	290	4,817
TOTAL:	12,190	7,475	10,555	10,250	6,941	2,468	49,879

TABLE 25-B PUBLIC AT GRADE CROSSINGS BY
TYPICAL DAILY TRAIN MOVEMENTS AND AVERAGE DAILY TRAFFIC
CROSSINGS WITHOUT TRAIN ACTIVATED WARNING DEVICES

TRAFFIC	TRAIN MOVEMENTS						TOTAL
	0 TO 2	3 TO 5	6 TO 10	11 TO 20	21 TO 40	>40	
0 TO 250	56,140	17,398	17,987	10,479	5,165	704	107,873
251 TO 500	10,347	3,100	2,988	1,650	740	114	18,939
501 TO 1,000	8,580	2,478	2,054	1,251	518	106	14,987
1001 TO 5,000	12,772	3,204	2,501	1,536	559	115	20,687
5001 TO 10,000	3,120	650	411	211	65	39	4,496
MORE THAN 10,000	1,612	298	197	77	28	9	2,221
TOTAL:	92,571	27,128	26,138	15,204	7,075	1,087	169,203

TABLE 26 PUBLIC AT GRADE CROSSINGS BY STATE
AND HIGHEST PROTECTION LEVEL

State	Crossings Meeting Minimum Standards		Gates	Flashing Lights	Sig, WW Bells	Highest Protection Level				None	Total
	Or FA System	Off FA System				Special Prot	Cross-bucks	Stop Signs	Other Signs		
Alabama	421	317	84	587	24	51	3,517	75	10	455	4,603
Alaska	40	6	1	44	---	18	145	2	1	13	224
Arizona	157	157	116	133	16	94	617	8	---	78	1,062
Arkansas	357	218	104	417	30	96	2,961	20	1	476	4,107
California	2,354	3,368	2,206	1,488	602	216	4,402	97	21	433	9,465
Colorado	188	308	71	362	41	346	1,392	21	2	111	2,346
Connecticut	63	160	47	175	8	94	85	10	3	126	548
Delaware	99	18	30	85	---	48	81	2	---	17	263
District of Columbia	3	---	---	3	---	12	25	6	---	24	70
Florida	898	1,246	652	986	14	193	3,519	44	109	387	5,904
Georgia	605	385	192	640	24	166	5,383	18	11	502	6,936
Hawaii	---	1	---	---	---	---	6	---	---	---	6
Idaho	167	103	16	209	14	21	1,858	7	2	84	2,211
Illinois	1,746	3,003	1,548	2,877	236	361	8,213	12	2	609	13,858
Indiana	1,664	1,893	620	2,344	180	289	5,675	98	15	716	10,137
Iowa	1,131	735	280	1,086	167	83	7,043	6	1	335	9,001
Kansas	828	479	237	813	115	270	7,982	2	1	305	9,725
Kentucky	457	481	171	626	38	140	2,118	8	1	593	3,695
Louisiana	389	446	105	696	19	84	2,912	324	29	842	5,011
Maine	152	289	58	327	39	172	504	---	4	16	1,120
Maryland	165	147	68	194	36	90	489	15	43	193	1,128
Massachusetts	317	342	164	442	43	247	283	2	2	47	1,230
Michigan	1,631	1,132	549	1,875	86	274	5,298	20	46	235	8,385
Minnesota	822	608	152	944	20	46	6,608	19	2	280	8,071
Mississippi	264	138	24	355	19	59	395	2,361	25	344	3,562
Missouri	878	694	194	1,033	160	159	4,589	8	3	494	6,640
Montana	157	138	61	206	10	22	1,765	4	1	223	2,292
Nebraska	609	324	191	535	67	70	4,474	4	23	272	5,636
Nevada	56	51	30	63	3	9	215	---	7	33	360
New Hampshire	109	87	25	154	16	180	304	9	4	26	718
New Jersey	334	709	358	637	32	415	644	6	3	120	2,215
New Mexico	110	95	71	116	11	13	604	---	6	26	847
New York	785	1,361	676	1,298	104	536	1,545	3	56	234	4,452
North Carolina	910	858	188	827	13	260	3,636	18	24	530	5,496
North Dakota	351	55	58	221	2	---	5,078	2	---	398	5,759
Ohio	1,806	2,538	682	2,306	97	116	6,236	15	17	499	9,968
Oklahoma	465	400	93	708	59	173	4,537	4	11	202	5,787
Oregon	406	414	243	189	79	112	1,851	100	12	358	2,944
Pennsylvania	849	1,256	503	1,383	110	801	2,817	78	442	610	6,744
Rhode Island	19	31	6	25	19	37	26	5	2	20	142
South Carolina	736	157	120	324	5	382	3,311	1	18	281	4,442
South Dakota	211	53	1	192	5	---	3,076	---	1	120	3,395
Tennessee	209	425	104	487	18	305	2,422	36	2	792	4,166
Texas	1,536	2,301	576	2,758	151	469	9,537	31	17	1,107	14,646
Utah	121	174	30	232	14	76	865	6	51	98	1,372
Vermont	78	87	12	146	7	57	344	1	7	21	595
Virginia	491	382	242	455	47	240	1,474	1	14	343	2,816
Washington	497	523	94	547	60	63	2,975	21	12	518	4,290
West Virginia	229	193	52	298	20	52	1,685	8	6	343	2,464
Wisconsin	1,166	780	238	1,230	444	294	4,880	1	3	243	7,333
Wyoming	78	68	16	103	8	1	429	1	1	61	620
Puerto Rico	13	3	4	1	2	48	---	---	---	---	55
Total.....	28,147	30,137	12,363	34,182	3,334	8,360	141,032	3,540	1,076	15,195	219,082

FOOTNOTE:

FA - Federal Aid

Sig - Highway Traffic Signals

WW - Wigwags

Special Prot - Special warning device not train activated, e.g., crossing flagged by train crew

TABLE 27 PUBLIC AT GRADE CROSSINGS BY RAILROAD AND HIGHEST PROTECTION LEVEL

Railroad	Crossings Meeting Minimum Standards		Gates	Flashing Lights	Sig. WW Bells	Highest Protection Level				None	Total
	On PA System	Off PA System				Special Prot	Cross-bucks	Stop Signs	Other Signs		
LINE HAUL - EASTERN DISTRICT											
Akron, Canton and Youngstown	59	68	1	67	2	3	145	1	2	1	222
Baltimore and Ohio Railroad	746	922	202	1,175	45	116	3,635	18	7	310	5,508
Bangor and Aroostook Railroad	40	56	6	82	7	13	102	---	---	4	214
Bessemer and Lake Erie Railroad	25	27	13	34	---	6	110	---	---	3	166
Boston and Maine Corporation	257	243	176	288	33	254	444	4	4	50	1,253
Canadian Pacific Railway Company	21	22	3	35	3	12	49	---	---	6	108
Central Vermont	29	60	9	79	1	2	121	2	2	8	224
Chesapeake and Ohio Railway	764	536	242	903	17	83	3,039	6	2	317	4,609
Chicago and Eastern Illinois	66	69	39	95	1	---	388	3	---	12	538
Chicago and Illinois Midland Railway	16	22	6	33	1	3	72	---	---	1	116
Consolidated Rail Corporation	4,136	5,335	2,042	6,244	426	1,903	12,064	168	522	2,029	25,418
Delaware and Hudson Railroad	110	220	129	181	8	21	163	2	21	21	546
Detroit and Toledo Shore Line	22	30	24	14	---	1	36	---	---	---	75
Detroit, Toledo and Ironton	93	110	16	109	---	9	381	1	---	14	530
Elgin, Joliet and Eastern	54	88	64	77	1	14	93	---	---	1	250
Grand Trunk Western	323	315	250	344	11	106	615	2	---	7	1,335
Illinois Terminal Railroad	37	24	5	52	---	---	120	2	---	18	197
Long Island Railroad	47	257	273	30	---	---	9	---	---	1	313
Maine Central Railroad	89	185	29	209	32	67	318	---	2	6	663
Missouri-Illinois Railroad	18	8	1	23	---	---	140	---	---	2	166
Monongahela Railway	10	7	---	13	1	---	72	1	---	9	96
Amtrak	13	19	22	10	---	---	1	---	---	---	33
Norfolk and Western Railway	1,266	1,521	514	1,665	147	192	4,904	18	10	374	7,824
Pittsburg and Lake Erie Railroad	4	27	18	10	2	3	64	---	---	15	112
Richmond Fredericksburg Potomac	28	24	27	4	5	62	13	---	---	3	114
Western Maryland Railway	85	89	22	134	12	28	259	2	17	26	500
SUBTOTAL, EASTERN	8,360	10,284	4,133	11,910	755	2,898	27,377	230	569	3,238	51,130
LINE HAUL - SOUTHERN DISTRICT											
Alabama Great Southern Railroad	---	---	---	---	---	---	---	---	---	---	---
Autotrain Corporation	---	---	---	---	---	---	---	---	---	---	---
Atlanta and West Point Railroad	14	25	10	26	3	34	74	---	---	5	152
Central of Georgia Railroad	---	---	---	---	---	---	---	---	---	---	---
Cinn., N.O. & Texas Pacific	---	---	---	---	---	---	---	---	---	---	---
Clinchfield Railroad	17	14	6	21	3	10	95	---	---	9	144
Florida East Coast Railway	117	456	341	169	---	3	309	---	1	15	838
Georgia Railroad	28	48	10	57	5	61	263	2	---	9	407
Georgia Southern & Florida	---	---	---	---	---	---	---	---	---	---	---
Illinois Central Gulf Railroad	1,036	1,051	403	1,342	193	181	5,003	2,225	17	714	10,078
Louisville and Nashville	852	1,212	244	1,345	56	221	5,000	77	13	1,035	7,991
Norfolk Southern Railway	---	---	---	---	---	---	---	---	---	---	---
Seaboard Coast Line Railroad	1,994	1,393	611	1,546	29	549	8,506	36	11	591	11,881
Southern Railway	1,276	1,138	323	1,491	37	640	8,741	35	37	1,788	13,092
SUBTOTAL, SOUTHERN	5,334	5,337	1,948	5,999	326	1,699	27,991	2,375	79	4,166	44,583
LINE HAUL - WESTERN DISTRICT											
Atchison, Topeka and Santa Fe	1,554	1,937	985	1,687	337	966	7,726	6	14	209	11,952
Burlington Northern	1,973	1,485	652	1,961	196	195	16,056	118	28	1,467	20,673
Chicago and Northwestern	1,437	1,183	403	1,470	491	160	8,188	5	6	416	11,139
Chi., Milw., St. Paul & Pacific	1,121	827	235	1,223	166	269	6,885	5	8	502	9,293
Chicago, Rock Island & Pacific	761	680	406	826	53	12	5,314	8	2	351	6,972
Colorado and Southern Railway	43	47	4	73	9	2	296	3	---	35	422
Denver and Rio Grande Western	96	166	34	214	2	6	769	4	2	84	1,115
Duluth, Missabe and Iron Range	44	19	4	52	---	4	192	---	1	---	253
Duluth, Winnipeg and Pacific	13	7	---	19	---	5	75	---	---	---	99
Port North and Denver Railway	100	47	10	105	---	3	701	---	2	117	938
Green Bay and Western Railroad	57	14	1	65	2	---	236	---	---	10	314
Kansas City Southern Railway	95	104	12	162	10	---	703	2	---	123	1,012
Lake Superior and Ishpeming	10	10	---	14	---	5	36	---	32	1	88
Minneapolis, Northfield and So.	8	28	---	32	---	11	74	---	---	5	122
Missouri-Kansas-Texas Railroad	208	267	40	349	61	3	1,563	1	1	196	2,214
Missouri Pacific Railroad	1,030	936	225	1,536	55	149	7,305	18	6	958	10,252
Northwestern Pacific Railroad	39	71	35	39	16	---	88	---	1	2	181
St. Louis-San Francisco Railway	546	415	99	760	52	219	4,018	107	3	292	5,550
St. Louis Southwestern Railway	164	155	58	238	---	2	1,059	9	---	58	1,424
Soc Line	457	245	52	553	30	1	3,615	1	1	112	4,365
Southern Pacific Trans. Company	2,220	3,038	2,015	1,642	522	31	6,580	85	24	930	11,829
Spokane International Company	---	---	---	---	---	---	---	---	---	---	---
Texas and Pacific Railway	164	223	65	301	4	1	1,141	2	---	180	1,694
Texas Mexican Railway Company	21	22	---	43	---	2	158	2	---	9	214
Toledo, Ecoria and Western	50	45	---	92	---	2	191	---	---	6	291
Union Pacific Railroad	778	664	266	855	89	362	5,702	20	56	492	7,842
Western Pacific	134	174	155	104	18	3	313	11	1	51	656
SUBTOTAL, WESTERN	13,123	12,811	5,756	14,415	2,113	2,433	78,984	409	188	6,606	110,904

TABLE 27 PUBLIC AT GRADE CROSSINGS BY RAILROAD AND HIGHEST PROTECTION LEVEL

Cont. Railroad	Crossings Meeting Minimum Standards		Gates	Flashing Lights	Sig, WW Bells	Highest Protection Level				None	Total		
	On FA System	Off FA System				Special Prot	Cross- bucks	Stop Signs	Other Signs				
SWITCHING - EASTERN DISTRICT													
Aliquippa and Southern Railroad	---	---	---	---	---	---	---	12	---	---	---	2	26
Altcr and Southern Railroad	10	2	3	9	---	---	---	---	---	---	---	---	---
Balt. and Ohio Chicago	14	82	43	50	2	24	22	1	---	---	---	8	150
Belt Railway Company of Chicago	3	13	6	10	---	1	20	---	---	---	---	1	38
Chicago, Union Station	---	1	1	---	---	---	---	---	---	---	---	---	1
Conemaugh and Black Lick	3	---	1	2	---	---	---	3	---	---	---	---	6
Cuyahoga Valley Railway Company	---	---	---	---	---	---	---	---	---	---	---	---	---
Indiana Harbor Belt Railroad	20	42	32	30	---	37	10	---	---	---	---	3	112
Indianapolis Union Railway	13	15	1	18	9	1	10	4	---	---	---	2	45
Lakefront Dock and Railroad	---	---	---	---	---	---	---	---	---	---	---	---	---
Lake Terminal Railroad Company	---	---	---	---	---	1	1	---	---	---	---	---	2
Monongahela Connecting Railroad	---	---	---	---	---	---	---	---	---	---	---	---	---
Patapsco and Back Rivers	2	1	---	---	1	4	---	---	---	---	---	---	5
Phila., Bethlehem and New Eng.	---	---	---	---	---	---	---	---	---	---	---	---	---
Portland Terminal Company	12	13	11	14	---	62	1	---	---	---	---	1	89
River Terminal Railway	---	2	---	2	---	---	5	---	---	---	---	---	7
South Buffalo Railway	---	---	---	---	---	2	---	---	---	---	---	---	2
Union Railroad "Penna."	2	15	3	14	---	---	---	---	---	---	---	---	17
Washington Terminal	---	---	---	---	---	---	---	---	---	---	---	---	---
SUBTOTAL, EASTERN	79	186	101	149	12	132	84	5	---	---	---	17	500
SWITCHING - SOUTHERN DISTRICT													
Birmingham Southern Railroad	14	6	---	20	---	---	21	---	---	---	---	---	41
Kentucky and Indiana Terminal	7	30	---	37	---	1	30	---	---	---	---	7	75
SUBTOTAL, SOUTHERN	21	36	---	57	---	1	51	---	---	---	---	7	116
SWITCHING - WESTERN DISTRICT													
Houston Belt and Terminal Railway	6	97	6	97	2	---	139	---	---	---	---	38	282
Kansas City Terminal Railway	2	6	---	6	---	---	11	---	1	---	---	27	47
Cyden Union Railway and Depot	---	---	---	---	---	---	---	---	---	---	---	---	---
Pecunia and Pekin Union Railway	2	21	1	22	---	13	---	---	---	---	---	---	36
Portland Terminal RR "Oregon"	---	2	---	2	---	81	---	1	---	---	---	14	98
Port Terminal RR Assoc.	1	22	---	23	---	---	26	---	---	---	---	9	58
Terminal Railroad Association	15	46	42	16	3	73	34	---	---	---	---	3	171
Texas Pacific-Missouri Pacific	---	---	---	---	---	---	---	---	---	---	---	---	---
SUBTOTAL, WESTERN	26	194	49	168	5	167	210	1	1	---	---	91	692
RECAPITULATION													
LINE HAUL - EASTERN	8,360	10,284	4,133	11,910	755	2,696	27,377	230	589	3,236	---	---	51,130
LINE HAUL - SOUTHERN	5,334	5,337	1,948	5,999	326	1,699	27,991	2,375	79	4,166	---	---	44,583
LINE HAUL - WESTERN	13,123	12,811	5,756	14,415	2,113	2,433	78,984	409	188	6,606	---	---	110,904
SWITCHING - EASTERN	79	186	101	149	12	132	84	5	---	---	---	17	500
SWITCHING - SOUTHERN	21	36	---	57	---	1	51	---	---	---	---	7	116
SWITCHING - WESTERN	26	194	49	168	5	167	210	1	1	---	---	91	692
CLASS II	---	---	376	1,484	123	1,030	6,335	520	219	1,070	---	---	11,157
TOTAL:	26,945	26,848	12,363	34,182	3,334	8,360	141,032	3,540	1,076	15,195	---	---	219,082

FOOTNOTE:

- FA - Federal Aid
- Sig - Highway Traffic Signals
- WW - Wigwags
- Special Prot - Special warning device not train activated, e.g., crossing flagged by train crew

APPENDIX A

DEFINITIONS

REPORTABILITY REQUIREMENTS

The Rules Governing Monthly Reports of Railroad Accidents/Incidents which were in effect at the close of 1976 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 \$1,750 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

Reportable accidents/incidents are divided into three primary groups, namely: I. Train Accidents; II. Train Incidents; and III. Nontrain Incidents.

I. 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.

II. 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 \$1,750.

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

CLASSIFICATION OF PERSONS

A) 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 whether he or she is or is not "on duty." 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."

B) 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.

NOTE: Employees who are injured while trespassing are categorized as trespassers.

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

D) 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 person adjacent to railroad premises when injured as the result of the operation of a railroad.

E) Trespassers are persons who are on that part of railroad property used in railroad operation, and whose presence are prohibited, forbidden, or unlawful.

NOTE: A person on a rail-highway grade crossing is classified as a trespasser if the crossing is protected by gates or other similar barriers which were closed when the person entered the crossing. He is also a trespasser if he attempts to pass over or under trains or cars at the crossings.

CLASSIFICATION OF ON-TRACK EQUIPMENT

Train - A train is a locomotive unit or locomotive units coupled, with or without cars and with or without markers displayed. Included in this definition are those train 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:

- (a) Any unit of equipment designed to be hauled by locomotives;
or
- (b) 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.

Highest Protection Level - At those crossings where more than one form of crossing protection is in use, the "Highest Protection Level" is determined by the following ranking:

- | | | |
|---------|-----|----------------------------------|
| Highest | 1) | Gates |
| | 2) | Cantilever Flashing Light Signal |
| | 3) | Standard Flashing Light Signal |
| | 4) | Wig Wags |
| | 5) | Highway Traffic Signals |
| | 6) | Audible |
| | 7) | Crossbucks |
| | 8) | Stop Signs |
| | 9) | Watchman |
| | 10) | Flagged by Crew |
| | 11) | Other |
| Lowest | 12) | None |

Daylight/Dark - Unless specifically listed, those accidents reported as occurring during dawn have been included in the daylight category. Likewise, those reported as occurring during dusk have been included in the dark category.

Crossing Meeting Minimum Standards. The Second Annual Report on Highway Safety Improvement Programs, (which is a report from the Secretary of Transportation to Congress), states that a program to sign and mark all crossings is a high priority under the Highway Safety Act of 1973. Further the report states that the National Rail-Highway Crossing inventory "...will allow the states to identify those crossings which are not signed and marked in accordance with the Manual on Uniform Traffic Control Devices (MUTCD)." The Federal Highway Administration has specified the following minimum standards for signing and marking to be in accordance with the MUTCD: An automatic warning device or two reflectorized crossbuck signs, advance warning signs, and pavement markings if the highway approach is paved. In this publication, crossings having automatic warning devices are counted as meeting minimum standards.

APPENDIX B

FORMS

Up to three separate forms may be required to properly report a Rail-Highway Grade Crossing Accident/Incident. These forms are:

FRA F 6180-57 Grade Crossing Accident/Incident Report

FRA F 6180-55 Railroad Injury and Illness Summary

FRA F 6180-54 Rail Equipment Accident/Incident Report

For all Reportable Grade Crossing Accidents/Incidents a form FRA F 6180-57 must be submitted by the carrier having on-track equipment involved. If reportable casualties resulted, these casualties must be reported individually on form FRA F 6180-55. Finally, if the accident also resulted in more than \$1,750 in damages to railroad on-track equipment, signals, track, track structures and roadbed, a form FRA 6180-54 must be submitted. Tables A through 22 are tabulated based on information contained on these three reports.

The source of data used in Tables 23 through 28 is the National Rail-Highway Crossing Inventory as of October 1, 1977.

DEPARTMENT OF TRANSPORTATION
FEDERAL RAILROAD ADMINISTRATION

RAIL-HIGHWAY GRADE CROSSING ACCIDENT/INCIDENT REPORT

FORM APPROVED
OMB NO. 04R4033

1. NAME OF REPORTING RAILROAD		Amtrak	1a. Alphabetic Code	1b. Railroad Accident/Incident No.
		Autotrain		
2. NAME OF OTHER RAILROAD INVOLVED IN TRAIN ACCIDENT/INCIDENT			2a. Alphabetic Code	2b. Railroad Accident/Incident No.
3. NAME OF RAILROAD RESPONSIBLE FOR TRACK MAINTENANCE (single entry)			3a. Alphabetic Code	3b. Railroad Accident/Incident No.
4. U. S. DOT-AAR GRADE CROSSING IDENTIFICATION NUMBER		5. DATE OF ACCIDENT/INCIDENT month day year		6. TIME OF ACCIDENT/INCIDENT am <input type="checkbox"/> pm <input type="checkbox"/>

LOCATION

7. NEAREST RAILROAD STATION	8. COUNTY	9. STATE (two letter code)	CODE
10. CITY (if in a city)	11. HIGHWAY NAME OR NUMBER (if private crossing, so state)		

ACCIDENT/INCIDENT SITUATION

12. TYPE 1. Auto 3. Truck-Trailer 6. Motorcycle 2. Truck 4. Bus 7. Pecestrian 5. School Bus 8. Other (specify)			CODE	16. EQUIPMENT 1. Train (units pulling) 3. Train (standing) 6. Light loco(s) (moving) 2. Train (units pushing) 4. Car(s) (moving) 7. Light loco(s) (standing) 5. Car(s) (standing) 8. Other (specify)			CODE
13. SPEED (estimated mph at impact)	14. DIRECTION (geographical) 1. North 3. East 2. South 4. West	CODE	17. POSITION OF CAR/UNIT IN TRAIN			CODE	
15. POSITION 1. Stalled on crossing 2. Stopped on crossing 3. Moving over crossing	CODE	18. CIRCUMSTANCE 1. Train struck highway user 2. Train struck by highway user			CODE		
19. Was the highway user and/or rail equipment involved in the impact transporting hazardous materials?						CODE	
						1. Highway user 2. Rail equipment 3. Both 4. Neither	

ENVIRONMENT

20. TEMPERATURE (specify, if minus) °F	21. VISIBILITY (single entry) 1. Dawn 3. Dusk 2. Day 4. Dark	CODE	22. WEATHER (single entry) 1. Clear 3. Rain 5. Sleet 2. Cloudy 4. Fog 6. Snow	CODE
---	--	------	---	------

TRAIN AND TRACK

23. TYPE OF TRAIN 1. Freight 3. Mixed 5. Yard/Switching 2. Passenger 4. Work 6. Light Locomotive(s)	CODE	24. TRACK TYPE USED BY TRAIN INVOLVED 1. Main 3. Siding 2. Yard 4. Industry	CODE
25. TRACK NUMBER OR NAME	26. FRA TRACK CLASSIFICATION	27. NUMBER OF LOCOMOTIVE UNITS	
28. NUMBER OF CARS	29. TRAIN SPEED (recorded speed, if available) MPH Est Recorded	30. TIME TABLE DIRECTION 1. North 3. East 2. South 4. West	
		CODE	

CROSSING WARNING

31. TYPE (place X in appropriate box(es)) 1. <input type="checkbox"/> Gates 5. <input type="checkbox"/> Hwy. Traffic Signals 9. <input type="checkbox"/> Watchman 2. <input type="checkbox"/> Car tilever FLS 6. <input type="checkbox"/> Audible 10. <input type="checkbox"/> Flagged by crew 3. <input type="checkbox"/> Standard FLS 7. <input type="checkbox"/> Crossbucks 11. <input type="checkbox"/> Other (specify) 4. <input type="checkbox"/> Wig Wags 8. <input type="checkbox"/> Stop Signs 12. <input type="checkbox"/> None	32. SIGNALLED CROSSING WARNING Was the signaled crossing warning identified in item 31 operating? 1. Yes 2. No		CODE
33. LOCATION OF WARNING 2. Side of vehicle approach 1. Both sides 3. Opposite side of vehicle approach	CODE	34. CROSSING WARNING INTERCONNECTED WITH HIGHWAY SIGNALS 1. Yes 2. No 3. Unknown	CODE
		35. CROSSING ILLUMINATED BY STREET LIGHTS OR SPECIAL LIGHTS 1. Yes 2. No 3. Unknown	

MOTORIST ACTION

36. MOTORIST PASSED STANDING HIGHWAY VEHICLE 1. Yes 2. No 3. Unknown	CODE	37. MOTORIST DROVE BEHIND OR IN FRONT OF TRAIN AND STRUCK OR WAS STRUCK BY SECOND TRAIN 1. Yes 2. No 3. Unknown	CODE
38. MOTORIST 1. Drove around or thru the gate 2. Stopped and then proceeded 3. Did not stop 4. Other (specify) 5. Unknown			
39. VIEW OF TRACK OBSCURED BY (primary obstruction) 1. Permanent structure 2. Standing railroad equipment 3. Passing train 5. Vegetation 7. Other (specify) 4. Topography 6. Highway vehicles 8. Not obstructed			

HIGHWAY VEHICLE PROPERTY DAMAGE/CASUALTIES

40. HIGHWAY VEHICLE PROPERTY DAMAGE (est. dollar damage)	41. DRIVER WAS 1. Killed 2. Injured 3. Uninjured	CODE	42. WAS DRIVER IN THE VEHICLE? 1. Yes 2. No	CODE
43. TOTAL NUMBER OF OCCUPANTS KILLED	44. TOTAL NUMBER OF OCCUPANTS INJURED	45. TOTAL NUMBER OF OCCUPANTS (include driver)		
46. IS A RAIL EQUIPMENT ACCIDENT/INCIDENT REPORT BEING FILED? 1. Yes 2. No				
47. TYPED NAME AND TITLE	48. SIGNATURE	49. DATE		

DEPARTMENT OF TRANSPORTATION
FEDERAL RAILROAD ADMINISTRATION

RAIL EQUIPMENT ACCIDENT/INCIDENT REPORT

FORM APPROVED
OMB NO. 04R4008

1. NAME OF REPORTING RAILROAD		Amtrak <input type="checkbox"/>	1a. Alphabetic Code	1b. Railroad Accident/Incident No.
		Autotrain <input type="checkbox"/>		
2. NAME OF OTHER RAILROAD INVOLVED IN TRAIN ACCIDENT/INCIDENT			2a. Alphabetic Code	2b. Railroad Accident/Incident No.
3. NAME OF RAILROAD RESPONSIBLE FOR TRACK MAINTENANCE (single entry)			3a. Alphabetic Code	3b. Railroad Accident/Incident No.
4. U. S. DOT-AAR GRADE CROSSING IDENTIFICATION NUMBER			5. DATE OF ACCIDENT/INCIDENT month | day | year	6. TIME OF ACCIDENT/INCIDENT am <input type="checkbox"/> pm <input type="checkbox"/>
7. TYPE OF ACCIDENT/INCIDENT (enter number in code box, single entry) CODE				
1. Derailment 3. Rear end collision 5. Raking collision 7. Rail-Hwy crossing 9. Obstruction 11. Fire or violent rupture 12. Other (specify) 2. Head on collision 4. Side collision 6. Broken train collision 8. RR grade crossing 10. Explosion-Defonation				

HAZARDOUS MATERIALS (number of)			
8. CARS CARRYING	9. CARS DAMAGED OR DERAILED	10. CARS WHICH RELEASED HAZ. MAT.	11. PEOPLE EVACUATED (est.)

LOCATION			
12. DIVISION	13. NEAREST STATION	14. MILEPOST (to nearest tenth)	15. STATE (two letter code) CODE

ENVIRONMENTAL CONDITIONS			
16. TEMPERATURE (specify if minus) °F	17. VISIBILITY (single entry) CODE 1. Dawn 3. Dusk 2. Day 4. Dark	18. WEATHER (single entry) CODE 1. Clear 2. Cloudy 3. Rain 4. Fog 5. Sleet 6. Snow	

OPERATIONAL DATA			
19. METHOD (place X in appropriate box(es))			
1 <input type="checkbox"/> Manual block	4 <input type="checkbox"/> Automatic block	7 <input type="checkbox"/> Yard rules	10 <input type="checkbox"/> Auto. train control
2 <input type="checkbox"/> Interlocking	5 <input type="checkbox"/> Traffic control	8 <input type="checkbox"/> Time table	11 <input type="checkbox"/> Verbal permission
3 <input type="checkbox"/> Cab signal	6 <input type="checkbox"/> Auto. train stop	9 <input type="checkbox"/> Radio	12 <input type="checkbox"/> Train orders
20. SPEED (recorded speed, if available) Est. MPH	21. TRAIN NUMBER	22. TIME TABLE DIRECTION CODE 1. North 2. South 3. East 4. West	

EQUIPMENT			
23. TRAILING TONS (gross tonnage, excluding power units)	24. TYPE OF EQUIPMENT CONSIST (single entry) CODE 1. Freight train 3. Mixed train 5. Single car 7. Yard/switching 2. Passenger train 4. Work train 6. Cut of cars 8. Light loco(s)	25. WAS THE EQUIPMENT IDENTIFIED IN ITEM 24 UNATTENDED? CODE 1. Yes 2. No	
26. TRACK NUMBER OR NAME	27. FRA TRACK CLASSIFICATION	28. ANNUAL TRACK DENSITY (gross tons in millions)	29. TYPE OF TRACK CODE 1. Main 3. Siding 2. Yard 4. Industry
30. PRINCIPLE CAR/UNIT	30a. Initial and Number	30b. Position in Train	30c. Loaded (yes or no)
(1) First Involved (derailed, struck, striking, etc.)			
(2) Causing (mechanical failures)			
31. LOCOMOTIVE UNITS (no. of)	a. Head End	Mid Train b. Manual c. Remote	Rear End d. Manual e. Remote
(1) Total in Train			32. CARS (no. of)
(2) Total Derailed			(1) Total in Equipment Consist
			(2) Total Derailed

PROPERTY DAMAGE (estimated cost, including labor, to repair or replace)	
33. EQUIPMENT DAMAGE (to be reported for this equipment consist only) \$	34. TRACK, SIGNAL, WAY AND STRUCTURES DAMAGE (to be reported by railroad in item 3 only) \$

ACCIDENT/INCIDENT CAUSE CODE		
35. PRIMARY CAUSE CODE	36. CONTRIBUTING CAUSE CODE	37. If no code available, explain cause.

CASUALTIES		
38. NUMBER OF PERSONS INJURED	39. ESTIMATED TOTAL DAYS DISABILITY	40. NUMBER OF FATALITIES

CREW (no. of)				HOURS ON DUTY			
41. ENGINEERS	42. FIREMEN	43. CONDUCTORS	44. BRAKEMEN	45. ENGINEER Hrs: Mins:	46. CONDUCTOR Hrs: Mins:		

47. TYPED NAME AND TITLE	48. SIGNATURE	49. DATE
--------------------------	---------------	----------

50. NARRATIVE DESCRIPTION - Describe the cause, nature and circumstances of accident/incident

