

TRANSACTIONS

1954 REPORTS OF MORTALITY AND MORBIDITY EXPERIENCE

REPORTS OF THE COMMITTEE ON MORTALITY UNDER ORDINARY INSURANCES AND ANNUITIES

I. MORTALITY UNDER STANDARD ORDINARY INSURANCE ISSUES BETWEEN 1952 AND 1953 ANNIVERSARIES

THIS report covers the intercompany experience under standard Ordinary insurance issues between 1952 and 1953 anniversaries. It takes up in turn the mortality experienced under

1. Standard Ordinary insurance issued subject to a medical examination, during each of the first fifteen policy years,
2. Standard Ordinary insurance issued without a medical examination, during each of the first fifteen policy years, and
3. Standard Ordinary insurance—medical and nonmedical issues combined—during the sixteenth and subsequent policy years.

The names of the contributing companies and their proportionate contributions to the total exposures are given in Table A of the Appendix.

EXPERIENCE UNDER STANDARD MEDICALLY EXAMINED ISSUES DURING THE FIRST FIFTEEN YEARS OF INSURANCE

The current experience during the first fifteen years of insurance is based on an exposure of \$46,591,633,000 and actual claims of \$155,676,000, excluding war deaths. There were 392 policies representing \$1,382,000 in claims reported as deaths in the Korean War during this period.

Expected deaths were calculated on the 1946-49 Select Basic Table (*TSA II*, 506). The mortality ratios on this table, both excluding and including war deaths, are presented in Table 1 by age groups at issue for all years of issue combined. The experience by year of issue (or by policy year) for all ages at issue combined is presented in Table 2. The detailed experience by age groups at issue for each year of issue (or each policy year) is set forth in Table B of the Appendix.

The aggregate mortality ratio, excluding war deaths, for the period from 1952 to 1953 anniversaries (91.9%) was slightly lower than that (93.2%) for the period from 1951 to 1952 anniversaries.

When war deaths are included the aggregate mortality ratio for the period from 1952 to 1953 anniversaries is increased by .9 of a percentage point (from 91.9% to 92.8%). About 70% of the total amount of war claims was paid on policies issued at ages 10-24. The inclusion of war deaths increased the mortality ratios as follows:

- 14.5 percentage points for the age group 10-14 at issue,
- 16.3 percentage points for the age group 15-19 at issue,
- 9.9 percentage points for the age group 20-24 at issue, and
- 2.2 percentage points for the age group 25-29 at issue.

TABLE 1
STANDARD MEDICALLY EXAMINED ISSUES OF 1938 TO 1952
EXPERIENCE BETWEEN 1952 AND 1953 ANNIVERSARIES
BY AGE AT ISSUE
POLICY YEARS 1 TO 15 COMBINED
(Amounts Shown in \$1,000 Units)

AGES AT ISSUE	EXPOSED TO RISK	ACTUAL DEATHS		EXPECTED DEATHS ON 1946-1949 SELECT BASIC TABLE	MORTALITY RATIO	
		Excluding War Deaths	War Deaths		Excluding War Deaths	Including War Deaths
10-14	\$ 1,006,041	\$ 955	\$ 135	\$ 931	102.6%	117.1%
15-19	1,983,625	2,114	349	2,138	98.9	115.2
20-24	4,436,599	4,466	476	4,857	91.9	101.8
25-29	7,363,858	8,568	218	9,933	86.3	88.5
30-34	9,020,602	16,303	144	17,178	94.9	95.7
35-39	8,646,492	24,462	60	26,412	92.6	92.8
40-44	6,732,012	29,145	0	31,853	91.5	91.5
45-49	4,132,262	29,079	0	31,506	92.3	92.3
50-54	2,137,476	22,318	0	23,812	93.7	93.7
55-59	857,955	12,341	0	13,687	90.2	90.2
60-64	230,949	4,464	0	5,537	80.6	80.6
65 & over	43,762	1,461	0	1,468	99.5	99.5
All Ages	\$46,591,633	\$155,676	\$1,382	\$169,312	91.9%	92.8%

At ages 30 and over at issue, war deaths were negligible. This parallels the experience with Korean War deaths in earlier periods and indicates the extent to which war deaths have been concentrated at ages under 30 at issue.

Table 2 reveals no clear-cut differences in mortality by year of issue (or by policy year). Nearly 65% of the total amount of war claims on the 15 years of issue covered by the study was paid on the issues of 1948-1952,

inclusive. The inclusion of war deaths increased the mortality ratios as follows:

- 1.4 percentage points for the issues of 1952,
- 3.0 percentage points for the issues of 1951,
- 2.9 percentage points for the issues of 1950,
- 1.4 percentage points for the issues of 1949, and
- 1.2 percentage points for the issues of 1948.

TABLE 2

STANDARD MEDICALLY EXAMINED ISSUES OF 1938 TO 1952
EXPERIENCE BETWEEN 1952 AND 1953 ANNIVERSARIES
BY YEAR OF ISSUE
ALL AGES COMBINED
(Amounts Shown in \$1,000 Units)

YEAR OF ISSUE	POLICY YEAR	EXPOSED TO RISK	ACTUAL DEATHS		EXPECTED DEATHS ON 1946-1949 SELECT BASIC TABLE	MORTALITY RATIO	
			Excluding War Deaths	War Deaths		Excluding War Deaths	Including War Deaths
1938	15	\$ 2,009,047	\$ 13,182	\$ 32	\$ 16,023	82.3%	82.5%
1939	14	1,733,394	10,700	28	11,944	89.6	89.8
1940	13	1,984,933	10,810	31	12,042	89.8	90.0
1941	12	2,458,975	12,530	46	13,386	93.6	93.9
1942	11	1,768,216	8,872	35	9,661	91.8	92.2
1943	10	2,046,336	11,464	30	11,141	102.9	103.2
1944	9	2,360,420	11,097	34	12,023	92.3	92.6
1945	8	2,626,019	11,167	56	11,902	93.8	94.3
1946	7	3,935,753	11,849	125	13,398	88.4	89.4
1947	6	3,834,369	11,749	79	12,915	91.0	91.6
1948	5	3,574,670	9,876	129	10,791	91.5	92.7
1949	4	3,824,716	8,929	137	9,720	91.9	93.3
1950	3	4,669,700	9,384	288	9,938	94.4	97.3
1951	2	4,469,029	7,521	241	7,958	94.5	97.5
1952	1	5,296,056	6,546	91	6,470	101.2	102.6
All Years of Issue		\$46,591,633	\$155,676	\$1,382	\$169,312	91.9%	92.8%

For no other year of issue was the mortality ratio increased by more than 1.0 percentage point on account of inclusion of war deaths. This gives some indication of the extent to which war deaths were concentrated on recently issued policies.

Table 3 presents an analysis of the current experience on medical issues according to the major subdivisions by cause of death based on the Committee's 1950 Code for Cause of Death (*TSA I, 617*). This table shows the

percentage distribution by cause of death of *amounts* paid in claims; the corresponding percentage distribution by cause of death of the *numbers* of claims paid was not significantly different.

EXPERIENCE UNDER STANDARD NONMEDICAL ISSUES DURING THE
FIRST FIFTEEN YEARS OF INSURANCE

The current experience during the first fifteen years of insurance is based on an exposure of \$11,231,408,000 and actual claims of \$14,801,000,

TABLE 3
STANDARD MEDICALLY EXAMINED ISSUES OF 1938 TO 1952
EXPERIENCE (INCLUDING WAR DEATHS) BE-
TWEEN 1952 AND 1953 ANNIVERSARIES
PERCENTAGE DISTRIBUTION BY CAUSE OF DEATH OF AMOUNTS PAID IN CLAIMS

Cause of Death	Tuber- cu- losis (All Forms)	Malign- ant Neo- plasms	Dia- betes Meli- tus	Vascu- lar Le- sions Affect- ing Central Nerv- ous System	Dis- eases of the Heart and Circu- latory System	Pneu- monia and In- fluenza	Acci- dents and Homi- cide	Suic- ide	War Deaths	All Other Causes and Un- known
Committee's 1950 Code:	01, 02	18-33	37	42	49-55	56-59	88-96, 98	97	99	Resid- ual
Ages 10-29 at issue										
Policy Years 1-5	1%	11.4%	5%	1.5%	7.7%	2.0%	47.0%	4.0%	11.9%	13.9%
Policy Years 6-15	7	15.2	4	2.8	19.7	1.2	29.8	7.1	4.0	19.1
Policy Years 1-15	5	13.8	4	2.3	15.5	1.5	35.9	6.0	6.8	17.3
Ages 30-39 at issue										
Policy Years 1-5	4	17.6	3	2.2	25.1	.7	26.0	8.2	1.5	18.0
Policy Years 6-15	5	19.4	5	4.3	42.7	.9	9.8	4.9	.2	16.8
Policy Years 1-15	5	18.9	4	3.8	38.2	.9	13.9	5.8	.5	17.1
Ages 40-49 at issue										
Policy Years 1-5	2	19.2	.0	3.4	48.2	6	11.2	4.1	0	13.1
Policy Years 6-15	3	21.4	4	6.0	49.0	.7	6.1	3.1	0	13.0
Policy Years 1-15	3	20.9	3	5.4	48.8	.7	7.3	3.3	.0	13.0
Ages 50 and over at issue										
Policy Years 1-5	4	25.4	2	3.8	50.2	1.5	5.7	3.0	.0	9.8
Policy Years 6-15	6	23.8	7	7.3	47.4	1.3	3.2	1.3	.0	14.4
Policy Years 1-15	5	24.3	6	6.3	48.2	1.4	3.9	1.8	.0	13.0
All Ages at issue										
Policy Years 1-5	3	19.4	2	3.0	37.4	1.1	18.3	4.8	2.0	13.5
Policy Years 6-15	5	20.8	5	5.6	44.0	1.0	8.7	3.5	.4	15.0
Policy Years 1-15	4	20.5	4	4.9	42.2	1.0	11.3	3.8	.9	14.6

excluding war deaths. There were 378 policies representing \$778,000 in claims reported as deaths in the Korean War during this period.

It should be noted that nonmedical business has continued to grow in importance. Thus the exposures on nonmedical issues in the current study increased 14.2% over those in the study covering the period from 1951 to 1952 anniversaries, whereas the corresponding exposures on medical issues

increased only 3.6%. For the 16 companies contributing to this study, nonmedical insurance accounted for approximately 28.9% of the standard issues of 1952 (by amounts) as compared with 28.6% and 19.9% of the standard issues of 1951 and 1950 respectively.

Expected deaths were calculated on the 1946-49 Select Basic Table (TSA II, 506), which was based on the experience under medical issues. The mortality ratios for nonmedical business on this table, both excluding and including war deaths, are presented in Table 4, by age groups at issue

TABLE 4
STANDARD NONMEDICAL ISSUES OF 1938 TO 1952
EXPERIENCE BETWEEN 1952 AND 1953 ANNIVERSARIES
BY AGE AT ISSUE
POLICY YEARS 1 TO 15 COMBINED
(Amounts Shown in \$1,000 Units)

AGES AT ISSUE	EXPOSED TO RISK	ACTUAL DEATHS		EXPECTED DEATHS* ON 1946-1949 SELECT BASIC TABLE	MORTALITY RATIO*	
		Excluding War Deaths	War Deaths		Excluding War Deaths	Including War Deaths
10-14	\$ 622,233	\$ 520	\$ 53	\$ 486	107.0%	117.9%
15-19	1,981,913	1,916	278	1,939	98.8	113.2
20-24	2,950,865	2,655	343	2,781	95.5	107.8
25-29	2,606,423	2,509	85	2,899	86.5	89.5
30-34	1,695,691	2,646	17	2,655	99.7	100.3
35-39	935,012	2,341	2	2,440	95.9	96.0
40-44	346,109	1,584	0	1,477	107.2	107.2
45-49	77,106	533	0	501	106.4	106.4
50 and over	16,056	97	0	152	63.8	63.8
All Ages	\$11,231,408	\$14,801	\$778	\$15,330	96.5%	101.6%

* Not adjusted for distribution of exposures by age within each five year age group at issue.

for all years of issue combined. These mortality ratios understate the death rates on nonmedical business because in calculating the expected deaths no adjustment was made for the fact that the central ages of the exposures under nonmedical issues for issue age groups 35-39, 40-44, 45-49 and 50-54 were younger than the central ages of the mortality rates for these age groups in the 1946-49 Select Basic Table; this situation arose from the limiting ages for nonmedical issues of the contributing companies being variously set at 35, 40, 45 or 50, so that the exposures beyond these ages tended to fall off sharply. The mortality ratios on nonmedical business by year of issue (or by policy year) are presented in Table 5, also on this unadjusted basis. The details of the unadjusted experience by age

groups at issue for each year of issue (or each policy year) are set forth in Table C of the Appendix.

Table 4 brings out that, with war deaths excluded, nonmedical mortality was above the 1946-49 Select Basic Table at ages 40 and over at issue. For all durations combined, nonmedical mortality was higher than that on medical business in all age groups at issue except 15-19, and ages 50 and over (where the nonmedical exposure was very small).

The extent to which Table 4 understates the true mortality on nonmedical business is brought out by the figures shown below.

The unadjusted mortality ratios understate the true mortality on nonmedical business to a significant degree only for age groups 40-44 and

MORTALITY RATIOS ON NONMEDICAL ISSUES OF 1938 TO 1952
EXPERIENCE BETWEEN 1952 AND 1953 ANNIVERSARIES
BY AGE AT ISSUE
POLICY YEARS 1-15 COMBINED

AGES AT ISSUE	MORTALITY RATIOS EXCLUDING WAR DEATHS		MORTALITY RATIOS INCLUDING WAR DEATHS	
	Unadjusted	Adjusted*	Unadjusted	Adjusted*
35-39	95.9%	96.0%	96.0%	96.1%
40-44	107.2	112.0	107.2	112.0
45-49	106.4	112.7	106.4	112.7
50 and over	63.8	65.5	63.8	65.5
All Ages	96.5%	97.1%	101.6%	102.2%

* For distribution of exposures by age within each five year age group at issue.

45-49 at issue. The nonmedical business issued at ages 50 and over represents primarily business issued under special circumstances (as for instance under salary allotment plans) which do not affect the distribution of the exposures by age within each five year age group at issue.

Allowing for the understatement of the mortality ratios on nonmedical business issued at ages 40-44 and 45-49 as shown in Table 4, it appears that the mortality ratios on nonmedical business did not exceed those on medical business by as many as 5 percentage points at issue ages under 40, but were approximately 20 percentage points higher at issue ages 40-49.

The aggregate mortality ratio on nonmedical business, excluding war deaths, for the period from 1952 to 1953 anniversaries (96.5%) was 2.7 percentage points lower than that (99.2%) for the period from 1951 to 1952 anniversaries, both on an unadjusted basis. When war deaths are included, the current aggregate mortality ratio on nonmedical business is

increased by 5.1 percentage points (from 96.5% to 101.6%) on an unadjusted basis. Over 85% of the total amount of war claims was paid on policies issued at ages 10-24. The inclusion of war deaths increased the mortality ratios as follows:

- 10.9 percentage points for the age group 10-14 at issue,
- 14.4 percentage points for the age group 15-19 at issue,
- 12.3 percentage points for the age group 20-24 at issue, and
- 3.0 percentage points for the age group 25-29 at issue.

TABLE 5
STANDARD NONMEDICAL ISSUES OF 1938 TO 1952
EXPERIENCE BETWEEN 1952 AND 1953 ANNIVERSARIES
BY YEAR OF ISSUE
ALL AGES COMBINED
(Amounts Shown in \$1,000 Units)

YEAR OF ISSUE	POLICY YEAR	EXPOSED TO RISK	ACTUAL DEATHS		EXPECTED DEATHS* ON 1946-1949 SELECT BASIC TABLE	MORTALITY RATIO*	
			Excluding War Deaths	War Deaths		Excluding War Deaths	Including War Deaths
1938.....	15	\$ 211,232	\$ 666	\$ 7	\$ 751	88.7%	89.6%
1939.....	14	222,861	659	5	684	96.3	97.1
1940.....	13	252,143	653	3	666	98.0	98.5
1941.....	12	306,062	746	2	701	106.4	106.7
1942.....	11	257,490	609	7	571	106.7	107.9
1943.....	10	452,063	913	19	908	100.6	102.6
1944.....	9	505,326	919	28	959	95.8	98.7
1945.....	8	549,240	872	31	971	89.8	93.0
1946.....	7	1,020,295	1,332	45	1,479	90.1	93.1
1947.....	6	875,862	1,200	56	1,254	95.7	100.2
1948.....	5	774,079	904	87	1,043	86.7	95.0
1949.....	4	864,312	996	84	1,049	94.9	103.0
1950.....	3	1,114,382	1,284	142	1,216	105.6	117.3
1951.....	2	1,676,912	1,357	156	1,547	87.7	97.8
1952.....	1	2,149,149	1,691	106	1,531	110.5	117.4
All Years of Issue.....		\$11,231,408	\$14,801	\$778	\$15,330	96.5%	101.6%

* Not adjusted for distribution of exposures by age within each five year age group at issue.

In the age group 30-34 at issue, war deaths accounted for .6% of the claims. There was only one war death reported at older ages. This emphasizes again the extent to which war deaths have been concentrated at ages under 30 at issue.

Table 5 reveals no clear-cut differences in nonmedical mortality by duration. Nearly 75% of the total amount of war claims paid on the fifteen years' issues covered by this study was paid on the issues of 1948 to 1952

inclusive. The inclusion of war deaths increased the mortality ratios as follows:

- 6.9 percentage points for the issues of 1952,
- 10.1 percentage points for the issues of 1951,
- 11.7 percentage points for the issues of 1950,
- 8.1 percentage points for the issues of 1949, and
- 8.3 percentage points for the issues of 1948.

On the issues of 1943 and earlier years, the inclusion of war deaths did not increase any of the mortality ratios by more than 2.0 percentage points. This gives some indication of the extent to which war deaths have been concentrated on recently issued nonmedical policies. Adjustment of the mortality ratios shown in this table so that they would correspond to the distribution of nonmedical exposures by age within each five year age group at issue would not increase the mortality shown for any year of issue by more than one percentage point.

Table 6 presents an analysis of the current experience on nonmedical

TABLE 6
STANDARD NONMEDICAL ISSUES OF 1938 TO 1952
EXPERIENCE (INCLUDING WAR DEATHS) BE-
TWEEN 1952 AND 1953 ANNIVERSARIES
PERCENTAGE DISTRIBUTION BY CAUSE OF DEATH OF AMOUNTS PAID IN CLAIMS

Cause of Death:	Tuber- culosis (All Forms)	Malign- ant Neo- plasms	Dia- betes Mel- litus	Vascu- lar Le- sions Affect- ing Central Nervous System	Dis- eases of the Heart and Circu- latory System	Pnea- monia and In- fluen- za	Acci- dents and Homi- cide	Sui- cide	War Deaths	All Other Causes and Un- known
Committee's 1950 Code:	01, 02	18-33	37	42	49-55	56-59	88-96, 98	97	99	Resid- ual
Ages 10-29 at issue										
Policy Years 1-5	5%	8.0%	2%	1.3%	4.8%	8%	48.0%	2.9%	12.7%	20.8%
Policy Years 6-15	1.2	14.7	6	2.8	16.7	1.8	29.8	4.2	5.1	23.1
Policy Years 1-15	.8	11.2	4	2.0	10.4	1.3	39.4	3.5	9.1	21.9
Ages 30-39 at issue										
Policy Years 1-5	7	14.9	3	2.1	25.7	1.7	29.8	3.5	1.0	20.3
Policy Years 6-15	1.1	18.0	7	4.0	39.5	1.4	10.0	4.6	.1	20.6
Policy Years 1-15	1.0	17.0	.5	3.4	34.9	1.5	16.6	4.2	.4	20.5
Ages 40-49 at issue										
Policy Years 1-5	.2	18.3	.3	5.4	49.1	8	7.9	5.0	.0	13.0
Policy Years 6-15	.9	15.6	9	7.9	50.9	9	4.2	1.7	.0	17.0
Policy Years 1-15	.7	16.5	7	7.0	50.3	9	5.4	2.8	.0	15.7
Age 50 and over at issue										
Policy Years 1-5	0	22.7	.0	2.5	58.0	0	5.3	0	.0	11.5
Policy Years 6-15	0	22.7	.0	6.2	44.2	2.1	15.5	0	.0	9.3
Policy Years 1-15	0	22.7	.0	4.4	51.0	1.0	10.5	0	.0	10.4
All Ages at issue										
Policy Years 1-5	.5	10.8	.3	1.9	14.7	1.0	39.2	3.2	8.5	19.9
Policy Years 6-15	1.1	16.2	7	4.1	31.1	1.5	18.0	3.9	2.3	21.1
Policy Years 1-15	.8	13.8	.5	3.2	24.0	1.3	27.3	3.6	5.0	20.5

issues according to the major subdivisions by cause of death based on the Committee's 1950 Code for Cause of Death (TSA I, 617). This table shows the percentage distribution by cause of death of *amounts* paid in claims; the corresponding percentage distribution by cause of death of the *numbers* of claims paid was not significantly different.

Table 7 presents side by side the experience, excluding war deaths, on medical and nonmedical issues as reported to the Committee during the past three years, *i.e.*, for the period from 1950 to 1953 anniversaries. The nonmedical mortality ratios shown in this table have been adjusted approximately so as to reflect the distribution of nonmedical exposures by age within each five year age group at issue. In so far as these figures go,

TABLE 7
COMPARISON OF MEDICAL AND NONMEDICAL EXPERIENCE*
BETWEEN 1950 AND 1953 ANNIVERSARIES
BY AGE AT ISSUE AND DURATION (FIRST FIFTEEN POLICY YEARS)

AGES AT ISSUE	POLICY YEARS									
	1-2		3-5		6-10		11-15		1-15	
Mortality Ratios on 1946-49 Select Basic Table										
	Medi- cal %	Non- medi- cal %	Medi- cal %	Non- medi- cal %	Medi- cal %	Non- medi- cal %	Medi- cal %	Non- medi- cal %	Medi- cal %	Non- medi- cal %
10-19	107.1	105.0†	96.8	99.7†	97.6	90.4†	85.7	84.2†	93.4	94.9†
20-29	99.2	99.0†	85.8	93.3†	91.8	89.1†	86.7	96.0†	89.3	94.0†
30-39	90.9	99.4†	86.0	96.6†	97.9	103.7†	98.2	103.9†	95.1	101.7†
40-49	98.4	127.9†	92.9	113.9†	96.7	114.4†	90.2	110.1†	93.6	114.3†
50 and over	108.6	104.9†	90.9	83.8†	85.7	84.2†	90.6	109.8†	90.3	93.3†
All Ages.	99.0	102.4†	90.0	97.3†	93.5	98.1†	92.0	100.3†	92.7	99.2†
Ratios of Nonmedical to Medical Mortality Ratios										
10-19	98.0%		103.0%		92.6%		98.2%		101.6%	
20-29	99.8		108.7		97.1		110.7		105.3	
30-39	109.4		112.3		105.9		105.8		106.9	
40-49	130.0		122.6		118.3		122.1		122.1	
50 and over	96.6		92.2		98.2		121.2		103.3	
All Ages.	103.4%		108.1%		104.9%		109.0%		107.0%	

* Excludes war deaths.

† Adjusted for distribution of exposures by age within each five year age group at issue.

they continue to indicate (a) that nonmedical mortality is higher than that on medical business for ages 20 through 49 at issue at virtually all durations, and (b) that the excess of nonmedical mortality over medical mortality increases with advancing age at issue up to age 50. It should be kept in mind that the experience at ages 50 and over at issue is probably not typical because, as previously noted, it represents primarily business issued under special circumstances, as for instance under salary allotment plans.

Additional data furnished the Committee indicate that females continue to constitute a higher proportion of nonmedical issue (16.1%) than of medical issue (6.2%). This was noted in previous reports. To the extent that females constitute a higher proportion of the nonmedical experience than of the medical experience, Table 7 understates the excess of non-medical mortality over medical mortality.

EXPERIENCE UNDER STANDARD ISSUES DURING THE 16TH
AND SUBSEQUENT POLICY YEARS

The current experience during the 16th and subsequent policy years is based on an exposure of \$21,913,972,000 and actual claims of \$412,773,-

TABLE 8
STANDARD ISSUES DURING 16TH AND SUBSEQUENT POLICY YEARS
EXPERIENCE BETWEEN 1952 AND 1953 ANNIVERSARIES
BY ATTAINED AGE
ALL POLICY YEARS COMBINED
(Amounts Shown in \$1,000 Units)

ATTAINED AGES	EXPOSED TO RISK	ACTUAL DEATHS		EXPECTED DEATHS ON		MORTALITY RATIO ON			
		Exclud- ing War Deaths	War Deaths	1946- 1949 Ulti- mate Basic Table	CSO Table	1946-1949 Ultimate Basic Table		CSO Table	
						Exclud- ing War Deaths	Includ- ing War Deaths	Exclud- ing War Deaths	Includ- ing War Deaths
25-29	\$ 209,816	\$ 228	\$22	\$ 252	\$ 667	90.5%	99.2%	34.2%	37.5%
30-34	525,429	658	16	782	2,100	84.1	86.2	31.3	32.1
35-39	1,193,724	2,116	3	2,427	6,280	87.2	87.3	33.7	33.7
40-44	2,094,582	7,119	5	6,942	15,004	102.5	102.6	47.4	47.5
45-49	3,049,419	15,693	0	17,316	30,604	90.6	90.6	51.3	51.3
50-54	3,554,342	30,651	3	33,561	51,329	91.3	91.3	59.7	59.7
55-59	3,730,116	52,979	0	58,859	78,768	90.0	90.0	67.3	67.3
60-64	3,182,275	75,122	0	79,642	98,987	94.3	94.3	75.9	75.9
65-69	2,178,992	77,385	0	80,924	100,773	95.6	95.6	76.8	76.8
70-74	1,254,352	66,089	0	68,713	86,473	96.2	96.2	76.4	76.4
75-79	634,521	48,197	0	51,373	64,663	93.8	93.8	74.5	74.5
80-84	237,972	25,697	0	28,950	35,619	88.8	88.8	72.1	72.1
85-89	59,180	8,862	0	10,632	12,855	83.4	83.4	68.9	68.9
90-95	9,252	1,977	0	2,233	2,865	88.5	88.5	69.0	69.0
All Ages	\$21,913,972	\$412,773	\$49	\$442,606	\$586,987	93.3%	93.3%	70.3%	70.3%

000, excluding war deaths. There were 25 policies representing \$49,000 in claims reported as deaths in the Korean War during this period.

Expected deaths were calculated on the 1946-49 Ultimate Basic Table (TSA II, 507) and also on the Commissioners 1941 Standard Ordinary Mortality Table. The mortality ratios on these tables, both excluding and including war deaths, are presented in Table 8 by attained age groups.

The aggregate mortality ratio on the 1946-49 Ultimate Basic Table, excluding war deaths, for the period from 1952 to 1953 anniversaries (93.3%) was .9 of a percentage point higher than that (92.4%) for the period from 1951 to 1952 anniversaries, but 1.6 percentage points lower

TABLE 9
STANDARD ISSUES DURING 16TH AND SUBSEQUENT POLICY YEARS
EXPERIENCE (INCLUDING WAR DEATHS) BE-
TWEEN 1952 AND 1953 ANNIVERSARIES
PERCENTAGE DISTRIBUTION BY CAUSE OF DEATH OF AMOUNTS PAID IN CLAIMS

Cause of Death:	Tuber- culosis (All Forms)	Malign- ant Neo- plasms	Dia- betes Mell- itus	Vascu- lar Le- sions Affect- ing Central Nerv- ous System	Dis- eases of the Heart and Circu- latory System	Pneu- monia and Influ- enza	Acci- dents and Homi- cide	Sui- cide	War Deaths	All Other Causes and Un- known
Committee's 1950 Code:	01, 02	18-33	37	42	49-55	56-59	88-96, 98	97	99	Resid- ual
Attained Ages										
Under 40	2.0%	17.8%	1.0%	3.2%	25.7%	1.4%	19.7%	6.4%	1.3%	21.5%
40-49	8	21.0	7	4.7	44.0	.8	7.6	3.9	.0	16.5
50-59	5	18.4	8	7.7	51.6	.9	3.0	2.5	.0	14.6
60-69	4	16.6	1.0	9.8	54.9	1.4	1.9	1.3	.0	12.7
70-79	3	15.4	1.6	13.8	51.2	2.5	1.7	.4	.0	13.1
80 and over	3	11.5	.6	16.2	52.0	3.4	1.9	.4	.0	13.7
All Ages	4%	16.4%	1.1%	10.7%	52.1%	1.8%	2.5%	1.4%	.0%	13.6%

than that (94.9%) for the period from 1950 to 1951 anniversaries. The inclusion of war deaths increased the mortality ratios appreciably only at attained ages under 35—by 8.7 percentage points at attained ages 25-29 and by 2.1 percentage points at attained ages 30-34.

Table 9 presents an analysis of the current experience on business in the 16th and subsequent policy years according to the major subdivisions by cause of death based on the Committee's 1950 Code for Cause of Death (TSA I, 617). This table shows the percentage distribution by cause of death of *amounts* paid in claims; the corresponding percentage distribution by cause of death of the *numbers* of claims paid was not significantly different.

APPENDIX

TABLE A
 CONTRIBUTING COMPANIES
 PROPORTION OF TOTAL EXPOSURES
 CONTRIBUTED BY EACH

COMPANY	FIRST 15 POLICY YEARS		16TH AND SUBSEQUENT POLICY YEARS
	Medical Issues	Nonmedical Issues	
Metropolitan	24.2%	23.1%	28.0%
Prudential	14.6	35.6	12.2
New York Life	10.2	11.6	11.8
Northwestern Mutual	8.8		10.2
Equitable, N. Y.	8.6	7.3	11.8
John Hancock	4.8	8.7	3.3
Mutual Life, N. Y.	4.1	2.0	6.6
Mutual Benefit	4.0	.5	4.0
Massachusetts Mutual	3.7	1.7	4.9
Travelers	3.4	.6	4.5
Penn Mutual	3.3	1.2	4.4
Connecticut Mutual	2.8	2.6	2.1
Actna	2.7	.9	3.1
Provident Mutual	1.7	.1	2.3
Connecticut General	1.7	.4	1.0
Sun Life, Canada	1.4	3.7	1.6
Total	100.0%	100.0%	100.0%

TABLE B
STANDARD MEDICALLY EXAMINED ISSUES OF 1938 TO 1952
EXPERIENCE BETWEEN 1952 AND 1953 ANNIVERSARIES BY YEAR OF ISSUE
AND AGE AT ISSUE
EXPECTED DEATHS ON 1946-1949 SELECT BASIC TABLE
(Amounts Shown in \$1,000 Units)

ISSUE YEAR (POLICY YEAR)	AGES AT ISSUE	EXPOSED TO RISK	ACTUAL DEATHS		EXPECTED DEATHS	MORTALITY RATIO	
			Excluding War Deaths	War Deaths		Exclud- ing War Deaths	Includ- ing War Deaths
1938.... (15)	10-14	\$ 82,854	\$ 74	\$ 24	\$ 96	77%	102%
	15-19	121,936	134	8	171	78	83
	20-24	272,966	404	0	510	79	79
	25-29	360,227	906	0	1,063	85	85
	30-34	383,998	1,643	0	1,939	85	85
	35-39	318,660	2,176	0	2,616	83	83
	40-44	233,165	2,634	0	3,092	85	85
	45-49	139,183	2,296	0	2,947	78	78
	50-54	61,663	1,580	0	1,863	85	85
	55-59	25,062	836	0	1,093	76	76
	60-64	8,224	385	0	524	73	73
65 and over	1,109	114	0	109	105	105	
All Ages	\$2,009,047	\$13,182	\$ 32	\$16,023	82%	82%	
1939.... (14)	10-14	\$ 72,618	\$ 114	\$ 12	\$ 83	137%	152%
	15-19	114,774	108	1	147	73	74
	20-24	252,864	282	5	416	69	70
	25-29	313,337	614	0	802	77	77
	30-34	312,767	1,105	5	1,342	82	83
	35-39	263,320	1,996	5	1,833	109	109
	40-44	190,091	2,027	0	2,139	95	95
	45-49	120,009	1,873	0	2,185	86	86
	50-54	62,090	1,442	0	1,637	88	88
	55-59	24,176	765	0	931	82	82
	60-64	6,212	289	0	340	85	85
65 and over	1,136	85	0	95	89	89	
All Ages	\$1,733,394	\$10,700	\$ 28	\$11,944	90%	90%	
1940.... (13)	10-14	\$ 75,246	\$ 70	\$ 9	\$ 85	82%	93%
	15-19	133,436	169	7	161	68	72
	20-24	297,072	304	1	419	73	73
	25-29	362,954	784	9	806	97	98
	30-34	355,692	1,308	0	1,337	98	98
	35-39	298,064	1,585	5	1,836	86	87
	40-44	218,052	1,914	0	2,148	89	89
	45-49	137,790	2,066	0	2,216	93	93
	50-54	69,838	1,546	0	1,623	95	95
	55-59	27,956	720	0	954	75	75
	60-64	7,515	357	0	362	99	99
65 and over	1,318	47	0	95	49	49	
All Ages	\$1,984,933	\$10,810	\$ 31	\$12,042	90%	90%	
1941 (12)	10-14	\$ 83,246	\$ 119	\$ 16	\$ 93	128%	145%
	15-19	179,392	159	18	208	76	85
	20-24	367,035	392	4	477	82	83
	25-29	436,483	695	4	856	81	82
	30-34	446,450	1,628	0	1,487	109	109
	35-39	378,601	2,164	4	2,120	102	102
	40-44	262,602	2,157	0	2,293	94	94

TABLE B—Continued

ISSUE YEAR (POLICY YEAR)	AGES AT ISSUE	EXPOSED TO RISK	ACTUAL DEATHS		EXPECTED DEATHS	MORTALITY RATIO	
			Excluding War Deaths	War Deaths		Exclud- ing War Deaths	Includ- ing War Deaths
1941 ... (12)	45-49	\$ 174,365	\$ 2,499	\$ 0	\$ 2,540	98%	98%
	50-54	86,375	1,519	0	1,764	86	86
	55-59	31,933	842	0	968	87	87
	60-64	10,719	255	0	467	55	55
	65 and over	1,774	101	0	113	89	89
	All Ages	\$2,458,975	\$12,530	\$ 46	\$13,386	94%	94%
1942 ... (11)	10-14	\$ 61,070	\$ 67	\$ 30	\$ 67	100%	145%
	15-19	125,675	146	2	141	104	105
	20-24	207,842	245	0	247	99	99
	25-29	292,545	384	3	521	74	74
	30-34	315,922	910	0	932	98	98
	35-39	283,450	1,437	0	1,423	101	101
	40-44	209,534	1,570	0	1,632	96	96
	45-49	147,938	1,496	0	1,919	78	78
	50-54	82,266	1,263	0	1,487	85	85
	55-59	31,512	850	0	840	101	101
	60-64	8,770	421	0	353	119	119
	65 and over	1,692	83	0	99	84	84
	All Ages	\$1,768,216	\$ 8,872	\$ 35	\$ 9,661	92%	92%
1943 ... (10)	10-14	\$ 64,731	\$ 144	\$ 14	\$ 70	206%	226%
	15-19	115,337	134	10	126	106	114
	20-24	166,428	185	5	185	100	103
	25-29	281,324	451	1	444	102	102
	30-34	354,856	799	0	898	89	89
	35-39	370,760	1,967	0	1,620	121	121
	40-44	308,898	2,257	0	2,091	108	108
	45-49	211,296	2,390	0	2,356	101	101
	50-54	114,717	1,551	0	1,798	86	86
	55-59	44,398	1,153	0	1,023	113	113
	60-64	11,442	280	0	417	67	67
	65 and over	2,149	153	0	113	135	135
	All Ages	\$2,046,336	\$11,464	\$ 30	\$11,141	103%	103%
1944 ... (9)	10-14	\$ 77,454	\$ 77	\$ 18	\$ 79	97%	120%
	15-19	123,298	135	16	133	102	114
	20-24	154,435	133	0	164	81	81
	25-29	266,092	394	0	386	102	102
	30-34	407,040	878	0	920	95	95
	35-39	460,793	1,664	0	1,802	92	92
	40-44	408,715	2,693	0	2,465	109	109
	45-49	257,187	2,174	0	2,520	86	86
	50-54	138,634	1,638	0	1,960	84	84
	55-59	51,856	958	0	1,070	90	90
	60-64	12,547	214	0	412	52	52
	65 and over	2,369	139	0	112	124	124
	All Ages	\$2,360,420	\$11,097	\$ 34	\$12,023	92%	93%
1945 ... (8)	10-14	\$ 78,218	\$ 68	\$ 3	\$ 76	89%	93%
	15-19	124,135	144	40	133	108	138
	20-24	170,468	123	2	176	70	71
	25-29	295,886	282	1	399	71	71
	30-34	479,272	1,077	10	987	109	110

TABLE B—Continued

ISSUE YEAR (POLICY YEAR)	AGES AT ISSUE	EXPOSED TO RISK	ACTUAL DEATHS		EXPECTED DEATHS	MORTALITY RATIO	
			Excluding War Deaths	War Deaths		Excluding War Deaths	Including War Deaths
1945.... (8)	35-39	\$ 542,297	\$ 1,857	\$ 0	\$ 1,909	97%	97%
	40-44	442,651	1,969	0	2,395	82	82
	45-49	273,879	2,516	0	2,388	105	105
	50-54	147,914	1,657	0	1,904	87	87
	55-59	54,681	1,026	0	1,021	100	100
	60-64	14,150	389	0	410	95	95
	65 and over	2,468	59	0	104	57	57
	All Ages	\$2,626,019	\$11,167	\$ 56	\$11,902	94%	94%
1946.... (7)	10-14	\$ 81,521	\$ 81	\$ 6	\$ 72	113%	121%
	15-19	145,514	131	49	156	84	115
	20-24	427,717	352	21	419	84	89
	25-29	655,194	596	34	806	74	78
	30-34	773,024	1,266	15	1,399	90	92
	35-39	738,666	2,034	0	2,216	92	92
	40-44	555,313	2,287	0	2,649	86	86
	45-49	316,197	2,394	0	2,349	102	102
	50-54	164,583	1,489	0	1,871	80	80
	55-59	59,699	921	0	980	94	94
	60-64	15,505	244	0	380	64	64
65 and over	2,820	54	0	101	53	53	
	All Ages	\$3,935,753	\$11,849	\$125	\$13,398	88%	89%
1947.... (6)	10-14	\$ 74,668	\$ 50	\$ 2	\$ 61	82%	85%
	15-19	162,540	95	36	172	55	76
	20-24	348,397	390	24	341	114	121
	25-29	559,640	625	12	655	95	97
	30-34	745,738	1,226	5	1,238	99	99
	35-39	742,841	1,764	0	2,043	86	86
	40-44	586,763	2,478	0	2,623	94	94
	45-49	341,434	2,231	0	2,305	97	97
	50-54	184,312	1,393	0	1,959	71	71
	55-59	68,787	928	0	1,061	87	87
	60-64	16,209	406	0	361	112	112
	65 and over	3,040	163	0	96	170	170
		All Ages	\$3,834,369	\$11,749	\$ 79	\$12,915	91%
1948.... (5)	10-14	\$ 54,827	\$ 19	\$ 1	\$ 41	46%	49%
	15-19	131,524	171	24	139	123	140
	20-24	330,746	345	39	324	106	119
	25-29	561,194	488	44	629	78	85
	30-34	708,428	860	21	1,056	81	83
	35-39	673,024	1,334	0	1,635	82	82
	40-44	541,612	1,681	0	2,145	78	78
	45-49	318,767	1,379	0	1,897	73	73
	50-54	170,408	2,312	0	1,605	144	144
	55-59	63,359	831	0	882	94	94
	60-64	17,628	362	0	351	103	103
	65 and over	3,153	94	0	87	108	108
		All Ages	\$3,574,670	\$ 9,876	\$129	\$10,791	92%
1949.... (4)	10-14	\$ 51,920	\$ 33	\$ 0	\$ 34	97%	97%
	15-19	130,709	270	59	132	205	249

TABLE B—Continued

ISSUE YEAR (POLICY YEAR)	AGES AT ISSUE	EXPOSED TO RISK	ACTUAL DEATHS		EXPECTED DEATHS	MORTALITY RATIO	
			Excluding War Deaths	War Deaths		Excluding War Deaths	Including War Deaths
1949... (4)	20-24	\$ 366,770	\$ 378	\$ 60	\$ 345	110%	127%
	25-29	630,636	548	0	656	84	84
	30-34	752,360	1,055	18	971	109	111
	35-39	730,690	1,212	0	1,513	80	80
	40-44	567,490	1,784	0	1,867	96	96
	45-49	330,639	1,585	0	1,666	95	95
	50-54	171,616	1,096	0	1,328	83	83
	55-59	69,741	663	0	810	82	82
	60-64	18,465	234	0	312	75	75
	65 and over	3,680	71	0	86	83	83
	All Ages	\$3,824,716	\$ 8,929	\$137	\$ 9,720	92%	93%
1950... (3)	10-14	\$ 53,018	\$ 33	\$ 0	\$ 31	106%	106%
	15-19	156,932	116	66	151	77	121
	20-24	445,737	341	166	397	86	128
	25-29	810,345	686	31	786	87	91
	30-34	970,522	1,131	22	1,106	104	106
	35-39	877,049	1,336	3	1,561	86	86
	40-44	651,797	1,589	0	1,786	89	89
	45-49	394,580	1,866	0	1,685	111	111
	50-54	201,662	1,280	0	1,268	101	101
	55-59	83,664	710	0	796	89	89
	60-64	20,825	230	0	298	77	77
	65 and over	3,569	46	0	73	63	63
		All Ages	\$4,669,700	\$ 9,384	\$288	\$ 9,938	94%
1951... (2)	10-14	\$ 47,092	\$ 5	\$ 0	\$ 24	21%	21%
	15-19	109,904	90	13	92	98	112
	20-24	292,834	244	115	225	108	160
	25-29	682,771	478	54	560	85	95
	30-34	901,895	641	29	821	78	82
	35-39	893,520	1,074	30	1,242	86	89
	40-44	720,944	1,195	0	1,435	83	83
	45-49	450,454	1,075	0	1,423	76	76
	50-54	231,640	1,617	0	1,031	157	157
	55-59	104,258	802	0	713	112	112
	60-64	27,161	200	0	286	70	70
	65 and over	6,556	100	0	106	94	94
		All Ages	\$4,469,029	\$ 7,521	\$241	\$ 7,958	95%
1952... (1)	10-14	\$ 47,558	\$ 1	\$ 0	\$ 19	5%	5%
	15-19	108,519	172	0	76	226	226
	20-24	335,288	348	34	218	160	175
	25-29	855,230	637	25	564	113	117
	30-34	1,112,638	756	19	745	101	104
	35-39	1,074,757	862	13	1,043	83	84
	40-44	834,385	910	0	1,093	83	83
	45-49	518,544	1,239	0	1,110	112	112
	50-54	249,758	935	0	714	131	131
	55-59	116,873	336	0	545	62	62
	60-64	35,577	198	0	264	75	75
	65 and over	6,929	152	0	79	192	192
		All Ages	\$5,296,056	\$ 6,546	\$ 91	\$ 6,470	101%

TABLE C
STANDARD NONMEDICAL ISSUES OF 1938 TO 1952
EXPERIENCE BETWEEN 1952 AND 1953 ANNIVERSARIES BY YEAR OF ISSUE
AND AGE AT ISSUE

EXPECTED DEATHS ON 1946-1949 SELECT BASIC TABLE
(Amounts Shown in \$1,000 Units)

ISSUE YEAR (POLICY YEAR)	AGES AT ISSUE	EXPOSED TO RISK	ACTUAL DEATHS		EXPECTED DEATHS*	MORTALITY RATIO*	
			Exclud- ing War Deaths	War Deaths		Exclud- ing War Deaths	Includ- ing War Deaths
1938 (15)	10-14	\$ 15,231	\$ 19	\$ 1	\$ 18	106%	111%
	15-19	33,128	40	4	46	87	96
	20-24	57,776	73	0	108	68	68
	25-29	46,815	116	2	138	84	86
	30-34	33,794	177	0	171	104	104
	35-39	14,847	116	0	122	95	95
	40-44	7,372	77	0	98	79	79
	45-49	2,051	43	0	43	100	100
	50 and over	218	5	0	7	71	71
	All Ages	\$ 211,232	\$ 666	\$ 7	\$ 751	89%	90%
1939 (14)	10-14	\$ 15,432	\$ 18	\$ 0	\$ 18	100%	100%
	15-19	36,415	41	1	47	87	89
	20-24	60,304	88	3	98	90	93
	25-29	49,563	135	1	127	106	107
	30-34	34,927	160	0	150	107	107
	35-39	16,113	90	0	112	80	80
	40-44	7,720	76	0	87	87	87
	45-49	2,154	43	0	39	110	110
	50 and over	233	8	0	6	133	133
	All Ages	\$ 222,861	\$ 659	\$ 5	\$ 684	96%	97%
1940 (13)	10-14	\$ 16,067	\$ 8	\$ 1	\$ 19	42%	47%
	15-19	41,936	45	2	51	88	92
	20-24	71,195	103	0	100	103	103
	25-29	56,600	117	0	126	93	93
	30-34	38,999	141	0	147	96	96
	35-39	17,048	95	0	105	90	90
	40-44	7,825	105	0	77	136	136
	45-49	2,262	37	0	36	103	103
	50 and over	211	2	0	5	40	40
	All Ages	\$ 252,143	\$ 653	\$ 3	\$ 666	98%	98%
1941 (12)	10-14	\$ 15,979	\$ 21	\$ 2	\$ 18	117%	128%
	15-19	59,651	56	0	69	81	81
	20-24	88,754	102	0	115	89	89
	25-29	65,781	145	0	129	112	112
	30-34	45,311	164	0	151	109	109
	35-39	19,730	127	0	110	115	115
	40-44	8,632	81	0	75	108	108
	45-49	2,040	45	0	30	150	150
	50 and over	184	5	0	4	125	125
	All Ages	\$ 306,062	\$ 746	\$ 2	\$ 701	106%	107%
1942 (11)	10-14	\$ 16,148	\$ 16	\$ 3	\$ 18	89%	106%
	15-19	56,388	51	2	63	81	84
	20-24	62,971	83	1	75	111	111
	25-29	50,160	107	1	89	120	121
	30-34	39,751	127	0	117	109	109
	35-39	20,311	104	0	102	102	102

* Not adjusted for distribution of exposures by age within each five year age group at issue.

TABLE C—Continued

ISSUE YEAR (POLICY YEAR)	AGES AT ISSUE	EXPOSED TO RISK	ACTUAL DEATHS		EXPECTED DEATHS*	MORTALITY RATIO*	
			Exclud- ing War Deaths	War Deaths		Exclud- ing War Deaths	Includ- ing War Deaths
1942..... (11)	40-44	\$ 9,280	\$ 92	\$ 0	\$ 72	128%	128%
	45-49	2,243	27	0	29	93	93
	50 and over	238	2	0	6	33	33
	All Ages	\$ 257,490	\$ 609	\$ 7	\$ 571	107%	108%
1943..... (10)	10-14	\$ 38,233	\$ 41	\$ 11	\$ 41	100%	127%
	15-19	105,498	91	6	115	79	84
	20-24	94,532	96	2	105	91	93
	25-29	79,813	133	0	126	106	106
	30-34	68,400	169	0	173	98	98
	35-39	45,977	225	0	201	112	112
	40-44	16,717	127	0	113	112	112
	45-49	2,627	28	0	29	97	97
	50 and over	266	3	0	5	60	60
		All Ages	\$ 452,063	\$ 913	\$ 19	\$ 908	101%
1944..... (9)	10-14	\$ 52,310	\$ 55	\$ 16	\$ 53	104%	134%
	15-19	125,461	111	12	135	82	91
	20-24	95,144	102	0	101	101	101
	25-29	76,499	118	0	111	106	106
	30-34	72,504	140	0	164	85	85
	35-39	58,004	238	0	227	105	105
	40-44	22,010	104	0	133	78	78
	45-49	3,000	45	0	29	155	155
	50 and over	394	6	0	6	100	100
		All Ages	\$ 505,326	\$ 919	\$ 28	\$ 959	96%
1945..... (8)	10-14	\$ 56,287	\$ 57	\$ 9	\$ 55	104%	120%
	15-19	125,771	108	21	135	80	96
	20-24	103,886	86	0	107	80	80
	25-29	93,800	87	1	127	69	69
	30-34	79,407	155	0	164	95	95
	35-39	62,922	200	0	221	90	90
	40-44	23,382	148	0	126	117	117
	45-49	3,335	29	0	29	100	100
	50 and over	450	2	0	7	29	29
		All Ages	\$ 549,240	\$ 872	\$ 31	\$ 971	90%
1946..... (7)	10-14	\$ 46,998	\$ 51	\$ 5	\$ 41	124%	137%
	15-19	126,816	112	26	136	82	101
	20-24	327,300	238	12	321	74	78
	25-29	273,875	278	2	337	82	83
	30-34	137,075	247	0	248	100	100
	35-39	78,047	237	0	234	101	101
	40-44	25,158	149	0	120	124	124
	45-49	4,218	12	0	31	39	39
	50 and over	808	8	0	11	73	73
		All Ages	\$1,020,295	\$1,332	\$ 45	\$1,479	90%
1947..... (6)	10-14	\$ 49,309	\$ 37	\$ 3	\$ 40	93%	100%
	15-19	166,174	182	50	176	103	132
	20-24	251,871	190	0	247	77	77
	25-29	186,899	201	0	219	92	92
	30-34	112,962	193	3	188	103	104
	35-39	73,726	213	0	203	105	105
	40-44	28,158	135	0	126	107	107

* Not adjusted for distribution of exposures by age within each five year age group at issue.

TABLE C—Continued

ISSUE YEAR (POLICY YEAR)	AGES AT ISSUE	EXPOSED TO RISK	ACTUAL DEATHS		EXPECTED DEATHS*	MORTALITY RATIO*	
			Exclud- ing War Deaths	War Deaths		Exclud- ing War Deaths	Includ- ing War Deaths
1947..... (6)	45-49	\$ 5,277	\$ 41	\$ 0	\$ 36	114%	114%
	50 and over	1,486	8	0	19	42	42
	All Ages	\$ 875,862	\$1,200	\$ 56	\$1,254	96%	100%
1948..... (5)	10-14	\$ 44,231	\$ 60	\$ 2	\$ 33	182%	188%
	15-19	148,132	131	57	157	83	120
	20-24	229,067	186	20	224	83	92
	25-29	165,102	158	8	185	85	90
	30-34	93,728	135	0	140	96	96
	35-39	60,692	93	0	147	63	63
	40-44	25,315	111	0	100	111	111
	45-49	5,758	14	0	34	41	41
	50 and over	2,054	16	0	23	70	70
	All Ages	\$ 774,079	\$ 904	\$ 87	\$1,043	87%	95%
1949..... (4)	10-14	\$ 47,653	\$ 37	\$ 0	\$ 31	119%	119%
	15-19	155,359	141	46	157	90	119
	20-24	253,961	250	34	239	105	119
	25-29	190,288	132	2	198	67	68
	30-34	113,149	162	2	146	111	112
	35-39	68,665	109	0	142	77	77
	40-44	27,629	108	0	91	119	119
	45-49	5,983	48	0	30	160	160
	50 and over	1,625	9	0	15	60	60
	All Ages	\$ 864,312	\$ 996	\$ 84	\$1,049	95%	103%
1950..... (3)	10-14	\$ 55,409	\$ 31	\$ 0	\$ 33	94%	94%
	15-19	202,616	228	45	195	117	140
	20-24	320,697	353	73	285	124	149
	25-29	255,709	214	19	248	86	94
	30-34	156,584	190	5	179	106	109
	35-39	82,679	150	0	147	102	102
	40-44	32,541	77	0	89	87	87
	45-49	6,576	35	0	28	125	125
	50 and over	1,571	6	0	12	50	50
	All Ages	\$1,114,382	\$1,284	\$142	\$1,216	106%	117%
1951..... (2)	10-14	\$ 70,672	\$ 37	\$ 0	\$ 35	106%	106%
	15-19	267,539	262	5	225	116	119
	20-24	413,109	285	127	318	90	130
	25-29	428,284	218	22	351	62	68
	30-34	288,362	204	2	262	78	79
	35-39	142,360	176	0	198	89	89
	40-44	49,181	121	0	98	123	123
	45-49	14,685	48	0	46	104	104
	50 and over	2,720	6	0	14	43	43
	All Ages	\$1,676,912	\$1,357	\$156	\$1,547	88%	98%
1952..... (1)	10-14	\$ 82,274	\$ 32	\$ 0	\$ 33	97%	97%
	15-19	331,029	317	1	232	137	137
	20-24	520,298	420	71	338	124	145
	25-29	587,235	350	27	388	90	97
	30-34	380,738	282	5	255	111	113
	35-39	173,891	168	2	169	99	101
	40-44	55,189	73	0	72	101	101
	45-49	14,897	38	0	32	119	119
	50 and over	3,598	11	0	12	92	92
	All Ages	\$2,149,149	\$1,691	\$106	\$1,531	110%	117%