

DELAWARE COMPENSATION RATING BUREAU, INC.

Tax Multiplier

**CALCULATION OF TAX MULTIPLIER FOR USE IN RETROSPECTIVE RATING PLANS
(O/T U.S.L. & H.W. Act Coverages)**

Expense Provisions for O/T U.S.L. & H.W. Classes

Losses	61.36
Loss Adjustment Expense	12.81
Loss & Loss Adjustment	74.17
Premium Discount	8.38
Acquisition	7.77
General Expenses	3.26
Profit and Contingencies	(2.65)
Taxes	2.33
Uncollectible Premium	1.10
Workers' Compensation Fund	3.00
Administrative Assessment	2.64
	25.83

If

- T = Tax multiplier
- E = Expense provision in rates (General, Acquisition, and Profit), less premium discount
- L = Loss provision in rates
- C = Loss conversion factor
- B = Assessments made on premiums
- A = Assessments made on losses (adjusted so as not to collect profit and general expense dollars on the extra premium generated by the assessments)

Using average discount (Schedule Y) this yields:

$$E = 0.0000 = \frac{ACQ}{0.0777} + \frac{GEN}{0.0326} + \frac{PROFIT}{(0.0265)} - \frac{PREM DISC}{0.0838}$$

$$A = 0.0436 = 0.0431 \times \frac{1 - 0.0000 - 0.0643}{1 - 0.0099 - 0.0643}$$

Then

$$T = \frac{E + L(1 + C + A)}{E + L(1 + C)} \times \frac{1}{1 - B - S}$$

$$S = \text{Delaware Insurance Plan Subsidy} = 0.0255$$

$$T = \frac{0.0000 + 0.6136(1 + 0.2087 + 0.0436)}{0.0000 + 0.6136(1 + 0.2087)} \times \frac{1}{1 - 0.0643 - 0.0255} = 1.1383$$