

Figure: 28 TAC §3.1506

$$q_x^{2012+n} = q_x^{2012} (1 - G2_x)^n$$

The resulting q_x^{2012+n} must be rounded to three decimal places per 1,000, e.g., 0.741 deaths per 1,000. The rounding must occur according to the formula above, starting at the 2012 period table rate.

For example, for a male age 30, $q_x^{2012} = 0.741$.

$q_x^{2013} = 0.741 * (1 - 0.010) ^ 1 = 0.73359$, which is rounded to 0.734.

$q_x^{2014} = 0.741 * (1 - 0.010) ^ 2 = 0.7262541$, which is rounded to 0.726.

A method leading to incorrect rounding would be to calculate q_x^{2014} as $q_x^{2013} * (1 - 0.010)$, or $0.734 * 0.99 = 0.727$. It is incorrect to use the already rounded q_x^{2013} to calculate q_x^{2014} .