**Section 302.APPENDIX C Maximum total ammonia nitrogen concentrations allowable for certain combinations of pH and temperature**

**Section 302.TABLE B Temperature and pH-Dependent Values of the CS (Chronic Standard) for Fish Early Life Stages Absent**

|  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| pH | Temperature, ˚Celsius | | | | | | | | | |
|  | 0-7 | 8 | 9 | 10 | 11 | 12 | 13 | 14 | 15 | 16 |
| 6 | 11.3 | 10.6 | 9.92 | 9.30 | 8.72 | 8.17 | 7.66 | 7.19 | 6.74 | 6.32 |
| 6.1 | 11.2 | 10.5 | 9.87 | 9.25 | 8.67 | 8.13 | 7.62 | 7.15 | 6.70 | 6.28 |
| 6.2 | 11.2 | 10.5 | 9.81 | 9.19 | 8.62 | 8.08 | 7.58 | 7.10 | 6.66 | 6.24 |
| 6.3 | 11.1 | 10.4 | 9.73 | 9.12 | 8.55 | 8.02 | 7.52 | 7.05 | 6.61 | 6.19 |
| 6.4 | 11.0 | 10.3 | 9.63 | 9.03 | 8.47 | 7.94 | 7.44 | 6.98 | 6.54 | 6.13 |
| 6.5 | 10.8 | 10.1 | 9.51 | 8.92 | 8.36 | 9.84 | 7.35 | 6.89 | 6.46 | 6.06 |
| 6.6 | 10.7 | 9.99 | 9.37 | 8.79 | 8.24 | 7.72 | 7.24 | 6.79 | 6.36 | 5.97 |
| 6.7 | 10.5 | 9.81 | 9.20 | 8.62 | 8.08 | 7.58 | 7.11 | 6.66 | 6.25 | 5.86 |
| 6.8 | 10.2 | 9.58 | 8.98 | 8.42 | 7.90 | 7.40 | 6.94 | 6.51 | 6.10 | 5.72 |
| 6.9 | 9.93 | 9.31 | 8.73 | 8.19 | 7.68 | 7.20 | 6.75 | 6.33 | 5.93 | 5.56 |
| 7 | 9.60 | 9.00 | 8.43 | 7.91 | 7.41 | 6.95 | 6.52 | 6.11 | 5.73 | 5.37 |
| 7.1 | 9.20 | 8.63 | 8.09 | 7.58 | 7.11 | 6.67 | 6.25 | 5.86 | 5.49 | 5.15 |
| 7.2 | 8.75 | 8.20 | 7.69 | 7.21 | 6.76 | 6.34 | 5.94 | 5.57 | 5.22 | 4.90 |
| 7.3 | 8.24 | 7.73 | 7.25 | 6.79 | 6.37 | 5.97 | 5.60 | 5.25 | 4.92 | 4.61 |
| 7.4 | 7.69 | 7.21 | 6.76 | 6.33 | 5.94 | 5.57 | 5.22 | 4.89 | 4.59 | 4.30 |
| 7.5 | 7.09 | 6.64 | 6.23 | 5.84 | 5.48 | 5.13 | 4.81 | 4.51 | 4.23 | 3.97 |
| 7.6 | 6.46 | 6.05 | 5.67 | 5.32 | 4.99 | 4.68 | 4.38 | 4.11 | 3.85 | 3.61 |
| 7.7 | 5.81 | 5.45 | 5.11 | 4.79 | 4.49 | 4.21 | 3.95 | 3.70 | 3.47 | 3.25 |
| 7.8 | 5.17 | 4.84 | 4.54 | 4.26 | 3.99 | 3.74 | 3.51 | 3.29 | 3.09 | 2.89 |
| 7.9 | 4.54 | 4.26 | 3.99 | 3.74 | 3.51 | 3.29 | 3.09 | 2.89 | 2.71 | 2.54 |
| 8 | 3.95 | 3.70 | 3.47 | 3.26 | 3.05 | 2.86 | 2.68 | 2.52 | 2.36 | 2.21 |
| 8.1 | 3.41 | 3.19 | 2.99 | 2.81 | 2.63 | 2.47 | 2.31 | 2.17 | 2.03 | 1.91 |
| 8.2 | 2.91 | 2.73 | 2.56 | 2.40 | 2.25 | 2.11 | 1.98 | 1.85 | 1.74 | 1.63 |
| 8.3 | 2.47 | 2.32 | 2.18 | 2.04 | 1.91 | 1.79 | 1.68 | 1.58 | 1.48 | 1.39 |
| 8.4 | 2.09 | 1.96 | 1.84 | 1.73 | 1.62 | 1.52 | 1.42 | 1.33 | 1.25 | 1.17 |
| 8.5 | 1.77 | 1.66 | 1.55 | 1.46 | 1.37 | 1.28 | 1.20 | 1.13 | 1.06 | 0.99 |
| 8.6 | 1.49 | 1.40 | 1.31 | 1.23 | 1.15 | 1.08 | 1.01 | 0.95 | 0.89 | 0.84 |
| 8.7 | 1.26 | 1.18 | 1.11 | 1.04 | 0.98 | 0.92 | 0.86 | 0.80 | 0.75 | 0.71 |
| 8.8 | 1.07 | 1.01 | 0.94 | 0.88 | 0.83 | 0.78 | 0.73 | 0.68 | 0.64 | 0.60 |
| 8.9 | 0.92 | 0.86 | 0.81 | 0.76 | 0.71 | 0.66 | 0.62 | 0.58 | 0.55 | 0.51 |
| 9.0 | 0.79 | 0.74 | 0.69 | 0.65 | 0.61 | 0.57 | 0.54 | 0.50 | 0.47 | 0.44 |

\* At 15˚ C and above, the criterion for fish ELS Absent is the same as the criterion for fish ELS Present.

(Source: Added at 26 Ill. Reg. 16931, effective November 8, 2002)