Maximum Goal Differential = 6

Beginning in the 2023-24 season, games decided in OT are treated as 0.5 goal W/L as opposed

to the full 1 goal win/loss that they were treated as in previous seasons.

To that end, the OTW and OTL columns are subsets of the totals in the W and L columns.

OTW and OTL are used to calculate the adjustment (OTAdj) needed for games decided in OT.

 RANK TEAM W L T OTW OTL GmPerf Sched OTAdj Total Last 5

 1,Liberty University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 10 1 0 1 1, 2.7, 9.0, 0.00 11.73, 12.53

 2,Adrian College,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 11 4 0 0 0, 2.6, 8.3, 0.00 10.86, 10.86

 3,Midland University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 17 0 1 0 0, 2.8, 7.7, 0.00 10.47, 9.96

 4,Maryville University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 10 9 0 0 1, 0.5, 8.8, 0.03 9.32, 8.15

 5,McKendree University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 9 5 1 0 0, 0.7, 8.4, 0.00 9.13, 8.61

 6,University of Michigan,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 9 0 1 0 0, 2.3, 6.7, 0.00 9.02, 9.08

 7,Indiana Tech,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 12 2 0 4 0, 2.5, 6.6, -0.14 9.00, 8.02

 8,Minot State University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 7 9 0 3 0, -0.5, 9.5, -0.09 8.93, 9.88

 9,Arizona State University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 10 1 0 0 0, 3.5, 5.4, 0.00 8.85, 9.18

 10,University of Michigan-Dearborn,\_\_\_\_\_\_\_\_\_\_ 10 3 1 0 0, 1.8, 6.6, 0.00 8.37, 9.07

 11,University of Massachusetts-Amherst,\_\_\_\_\_\_ 6 6 0 0 1, 0.5, 7.1, 0.04 7.68, 7.72

 12,Niagara University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 6 6 0 1 1, -0.1, 7.7, 0.00 7.57, 7.91

 13,University of Jamestown,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 6 4 0 0 0, 0.3, 7.3, 0.00 7.57, 7.40

 14,University of Minnesota,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 3 5 0 0 0, 0.1, 7.3, 0.00 7.40, 6.45

 15,Grand Valley State University,\_\_\_\_\_\_\_\_\_\_\_\_ 4 6 0 0 1, -0.4, 7.7, 0.05 7.31, 6.76

 16,Miami University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 1 11 0 0 2, -2.1, 9.3, 0.08 7.28, 8.69

 17,Lindenwood University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 2 7 1 0 0, -1.6, 8.7, 0.00 7.13, 7.99

 18,Lake Superior State University,\_\_\_\_\_\_\_\_\_\_\_ 4 10 1 0 1, -0.9, 7.5, 0.03 6.70, 6.79

 19,Michigan State University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 7 4 1 0 1, 0.7, 5.8, 0.04 6.50, 6.96

 20,Concordia University-Ann Arbor,\_\_\_\_\_\_\_\_\_\_\_ 4 8 0 0 0, -1.2, 6.9, 0.00 5.72, 6.67

 21,Penn State University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 4 6 0 0 0, -1.0, 6.6, 0.00 5.60, 4.36

 22,University of Utah,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 7 5 0 1 0, 0.8, 4.4, -0.04 5.06, 4.56

 23,University of Rhode Island,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 0 4 0 0 0, -2.5, 7.3, 0.00 4.81

 24,University of Colorado,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 2 8 0 0 0, -2.1, 6.6, 0.00 4.51, 5.16

 25,Grand Canyon University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 1 9 0 0 0, -4.0, 8.4, 0.00 4.38, 3.93

 26,Colorado State University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 4 8 1 0 1, -0.5, 4.7, 0.04 4.23, 3.76

 27,University of Denver,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 4 3 0 0 0, 0.4, 3.6, 0.00 3.99, 3.92

 28,Aquinas College,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 1 7 0 0 0, -2.6, 6.1, 0.00 3.44, 3.55

 29,Davenport University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 1 11 0 0 0, -4.5, 6.8, 0.00 2.33, 2.17

 30,Montana State University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 4 8 0 0 0, -1.7, 2.3, 0.00 0.54, 0.51

 31,University of Wyoming,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 0 6 0 0 0, -4.2, 1.8, 0.00 -2.41, -2.53

**Maximum Goal Differential = 1 (i.e. just considers W, L, T and schedule strength)**

 **RANK TEAM W L T OTW OTL GmPerf Sched OTAdj Total Last 5**

 **1,Liberty University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 10 1 0 1 1, 0.8, 7.4, 0.00 8.24, 8.45**

 **2,Midland University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 17 0 1 0 0, 0.9, 7.2, 0.00 8.10, 8.05**

 **3,University of Michigan,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 9 0 1 0 0, 0.9, 6.9, 0.00 7.77, 7.74**

 **4,Adrian College,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 11 4 0 0 0, 0.5, 7.2, 0.00 7.70, 7.85**

 **5,McKendree University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 9 5 1 0 0, 0.3, 7.3, 0.00 7.61, 7.58**

 **6,Maryville University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 10 9 0 0 1, 0.1, 7.5, 0.03 7.54, 7.23**

 **7,Arizona State University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 10 1 0 0 0, 0.8, 6.6, 0.00 7.46, 7.48**

 **8,Minot State University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 7 9 0 3 0, -0.1, 7.7, -0.09 7.44, 7.85**

 **9,Indiana Tech,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 12 2 0 4 0, 0.7, 6.9, -0.14 7.43, 7.17**

 **10,University of Michigan-Dearborn,\_\_\_\_\_\_\_\_\_\_ 10 3 1 0 0, 0.5, 6.8, 0.00 7.34, 7.32**

 **11,University of Jamestown,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 6 4 0 0 0, 0.2, 7.1, 0.00 7.26, 7.03**

 **12,University of Massachusetts-Amherst,\_\_\_\_\_\_ 6 6 0 0 1, 0.0, 7.1, 0.04 7.16, 7.26**

 **13,Niagara University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 6 6 0 1 1, 0.0, 7.1, 0.00 7.08, 7.42**

 **14,Michigan State University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 7 4 1 0 1, 0.3, 6.7, 0.04 6.99, 7.00**

 **15,Lindenwood University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 2 7 1 0 0, -0.5, 7.5, 0.00 6.97, 7.21**

 **16,Grand Valley State University,\_\_\_\_\_\_\_\_\_\_\_\_ 4 6 0 0 1, -0.2, 7.1, 0.05 6.94, 6.47**

 **17,University of Minnesota,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 3 5 0 0 0, -0.3, 7.1, 0.00 6.87, 6.69**

 **18,Lake Superior State University,\_\_\_\_\_\_\_\_\_\_\_ 4 10 1 0 1, -0.4, 7.2, 0.03 6.82, 7.13**

 **19,Miami University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 1 11 0 0 2, -0.8, 7.5, 0.08 6.77, 7.10**

 **20,Concordia University-Ann Arbor,\_\_\_\_\_\_\_\_\_\_\_ 4 8 0 0 0, -0.3, 7.0, 0.00 6.63, 7.09**

 **21,Penn State University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 4 6 0 0 0, -0.2, 6.8, 0.00 6.63, 6.32**

 **22,Grand Canyon University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 1 9 0 0 0, -0.8, 7.4, 0.00 6.60, 6.49**

 **23,University of Utah,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 7 5 0 1 0, 0.2, 6.4, -0.04 6.53, 6.20**

 **24,University of Colorado,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 2 8 0 0 0, -0.6, 7.0, 0.00 6.37, 6.43**

 **25,University of Denver,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 4 3 0 0 0, 0.1, 6.2, 0.00 6.30, 6.36**

 **26,Colorado State University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 4 8 1 0 1, -0.3, 6.5, 0.04 6.21, 6.31**

 **27,University of Rhode Island,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 0 4 0 0 0, -1.0, 7.1, 0.00 6.11**

 **28,Davenport University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 1 11 0 0 0, -0.8, 6.9, 0.00 6.09, 6.02**

 **29,Aquinas College,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 1 7 0 0 0, -0.8, 6.8, 0.00 6.06, 6.11**

 **30,Montana State University,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 4 8 0 0 0, -0.3, 5.9, 0.00 5.53, 5.55**

 **31,University of Wyoming,\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 0 6 0 0 0, -1.0, 5.7, 0.00 4.74, 4.67**

 **- \* in place of rank indicates team whose rank is based on fewer than 3 scores.**

 **The program starts all teams with an equal arbitrary value and then**

**adjusts them all recursively based on game scores until the lowest cumulative**

**error between expected goal differentials and actual goal differentials is**

**reached (convergence). One effect often noticed is that a team's rating can**

**change slightly without playing due to previous opponents playing which affects**

**their rating and their opponent's rating, etc.**

 **The Total column is in goal units and the difference in this value between**

**any two teams is the predicted goal differential for a game played at a**

**neutral site between those two teams.**

 **It should be noted that these rankings are an average performance value**

**for each team for the entire season, all games are equally weighted, so a team's**

**latest game may make up only 1/40th of a teams rating at the end of the season.**

 **Games that go to shootouts for decision are considered ties for ratings purposes.**

 **Actually, there are two different rankings listed below. The first is as described**

**above with the maximum goal differential used per game set at 7.**

 **This ordering ends up similar to** [**CCHP**](https://www.google.com/url?q=http://www.uafhockey.com/hratings.html&source=gmail-html&ust=1700760528025000&usg=AOvVaw1t2ARvtivoSbzISf0ufJsJ)**, although differences do arise due to CCHP**

**considering home ice advantage and CCHP not using a goal differential limit.**

 **The second ranking sets maximum goal differential at 1, thereby just considering**

**whether the game was won, lost, or tied (and strength of opponent). Note that the Total column**

**in the GD=1 ranking is therefore in win percentage units rather than goal units. A rated .01**

**ahead of B can be interpreted as saying that if these two teams played exclusively against**

**each other, A's predicted winning percentage is 1 percentage point higher than B's**

**(i.e. A's predicted winning percentage vs. B would be .495, B's against**

**A would be .505). However, since the teams do not play exclusively against the other it**

**is actually a little bit more complex than above as teams can be ranked as high as 1.0**

**above their average opponent (if they were undefeated and untied) and as low as 1.0**

**below their average opponent (if they lost all of their games).**

**Not surprisingly, the ordering ends up very similar to** [**KRACH**](https://www.google.com/url?q=http://rpihockey.net/misc.rank1.shtml&source=gmail-html&ust=1700760528025000&usg=AOvVaw14fUiH68qnSjKrN3k9i_QM)**.**

 **Currently, teams with as few as 3 scores are ranked. The more games that go**

**into a team's ranking, the more accurate their ranking will be.**