

How are the handicaps calculated?

The handicaps are purely a mathematical calculation based upon league form.

The starting point is a player who has a win percentage of 0% in Division 4 will have a handicap of 0. It is assumed that there is 50% overlap between divisions, i.e. a player who has won 100% in Division 4 would be expected to win 50% in Division 3 etc.

The other assumption (although based upon a calculation and from other leagues' experience) is the slope, i.e. the difference between the top and bottom player in a division. The slope used for the 14/15 season is 2, i.e. a player with 100% in division 4 would have a handicap of 200, a player with 50% in division 3 would have a handicap of 200 as well and a player with 0% in division 2 would also have a handicap of 200.

Once these base figures are worked out, it's just a case of working out where each player lies on the line for their division. The system adopted for ODTTA uses weighted league form from the current season and the previous two seasons. It uses 100% weight of the current season's form, 75% of the previous season's and 50% of the season's before that. The weighting also makes allowance for the number of matches played in each season.

This weighting should smooth out any jumps in form. It also ensures players moving between divisions have representative handicaps. These players can have handicaps that fall outside of the normal range for their current division.

Rapidly improving players, as in all previous systems, will often have an advantage as the system can underestimate their handicap. That's just their good luck.

Occasionally there will be new players who would likely have a win percentage >50% in the next higher division and their handicaps could be seen to be too low.

Conversely a new player struggling in a division who would likely have a win percentage <50% in the next lower division could be seen to have too high a handicap.

Players in their first season will only have a small amount of data, but this can work both for or against them depending on how representative their form has been or which teams they have played.

Let's take a calculation as an example. Player Adam Apple has played in Division 2 for the last three seasons.

In 14/15 Adam has won 5/27 matches played

In 13/14 he won 13/57

In 12/13 he won 16/48

The base value for Division 2 is 200 and the ceiling is 400.

The calculation is...

$$1*200*(27*((2.5-0.5*3)+(5/27))+0.75*57*((2.5-0.5*3)+(13/57))+0.5*48*((2.5-0.5*3)+(16/48)))/(27+0.75*57+0.5*48) = 248.54$$

Therefore Adam's handicap (rounded) is 249.

All the sum is doing is working out where Adam's weighted league form from the last three seasons puts him on the straight line from the division's base value with a slope of 2. The calculated handicap of 249 is 24% of the way up the 2nd division scale from 200 to 400 which ties in quite nicely with his total win %age of $34/132 = 26\%$ over the past three seasons.

The advantage of this system is it removes the estimated allocation of numbers by the handicapper. Handicaps are now solely based upon the player's own league form. Additionally it has the benefit of accounting for differing abilities within teams of more than 3 players, which is almost all of them.

The system may need some tweaking in future seasons if ODTTA choose to continue using the system. As this is the first season for ODTTA using this system it is unknown if the slope number is quite right yet. Only the results can prove this.