Each participant in the SN League has a handicap measured in Mins / Km which is used to determine the target time for the League events and the SN Handicap race.

The handicap is calculated by a combination of rating, age and gender.

The rating is a number from 1 (fastest) to 20.

The base handicap is 4mins 15secs per km for a Male adult (age 23-33)

To this is added 15 secs per km for each rating point

E.g. If your rating is 6 your rating handicap is 5mins 45 secs.

If you are aged over 33 (or under 23) this is then multiplied by an age adjustment. For each year you are over 33 your handicap is made 1% longer. This is calculated on a compounded basis.

E.g. If you are 63 then the age factor equals $1.01^30 = 1.348$ and so a 63 year old man with rating of 6 gets a handicap of 5mins 45 sec * 1.348 = 7mins 45 sec

Women are given a further 15% handicap allowance

E.g. A 63 year old woman with rating of 6 gets a handicap of 7mins 45 sec *1.15 = 8mins 55secs

The rating you are given is set by the SN League co-ordinator based on your last two years performances. The overall ratings are set in such a way that about a quarter of the field should achieve their target time. So if your rating (handicap) is set right you should beat your target time one in four times. As an example the winner of the League will usually have beaten their handicap time about 4 times over the season and so will get their handicap lowered by a couple of ratings (roughly 8-10%).

Your rating should give a pretty clear indication of how you perform relative to your age/gender category. A rating of 1-3 is excellent and means you should be competitive nationally in your age group. The League average rating is about 11 so anything below that and you are doing well. A rating of 11 corresponds to a time about 40% longer than a rating of 3. A rating much above 11 and you have plenty of scope for improving your orienteering skills.

The big advantage of using this system is that your rating should remain roughly constant over time. Your handicap in mins/km will go up as you age to take account of your slowing running speed. If your navigation skills improve then you should see your rating coming down. Obviously a prolonged injury will see your rating going up. More than 75% of league participants' ratings remain the same form year to year.

The age and gender factors are based on combining together Men's and Women's 5k, 10k and Marathon age class world records – these can be found on Wikipedia. And 1% per annum over 33 plus a 15% increase for Women over Men seems a good fit to the data. Finally for those below 23 there is an increase in handicap of 2% per annum.