

GENERAL RACE SERIES RULES AND INFORMATION

The Race Director will determine the number and location of the individual races. Cancellation of races due to weather or ski area closing will be honored. Check the web site at www.midwestmasters.org if cancellations seem likely. In the case of a cancellation, if possible, the race will be rescheduled. In the event the race is not completed due to timing or other problems, the race will be postponed and rescheduled if possible. Courses are set, to the extent possible, to the minimum FIS Women's criterion to ensure a safe, challenging, and fun event. Unless snow removal requires otherwise, course inspection should be by side slipping outside of the race line (or outside the course corridor if snow conditions warrant). There shall be no high speed skiing within the race arena or shadowing of the course during inspection or competition. It is the responsibility of all participants to help with course maintenance. Racers will be governed by the applicable FIS and USSA rules. Rules can be found in the current USSA Alpine Masters Competition Guide at www.ussa.org.

The Race Director will administer any other exceptions to the FIS or USSA rules. Existing exceptions are as follows:

- Second runs will be reset or redressed at the Race Directors discretion
- Run Order will be determined by the Race Director, but will follow general Class Rules (see "Race Classes" below)
- Due to the number of competitors at MWM events, Class Groups are not utilized and all racers run on the same course. It is up to the Race Director to determine if the number of racers in a race justifies separate courses and/or to run in Class Groups.
- An Elite Class (commonly called the "bibbo") will be determined for 2nd runs based on the result of the first run. Under no circumstances will racers over the age of 60 (Age Class 8 and above) run after the Elite Class.
- Racers who DNS, DNF, or DQ on the first run may run at the end of the race to receive a 2nd run time (or in their 1st run start position if Ave Class 8 or above)
- In both SL and GS we will use the "READY GO" start signal. Competitors must start within 10 seconds of this signal.
- Other non-std rules??????

REGISTRATION

A bib number is required at registration. New members will receive a bib at or before their first race. It is the racer's responsibility to wear this bib at all events they attend. They also must retain this bib until a new one is issued. *In the event of a lost bib, a fee of \$45 will be charged to the racer.*

- Any Race Fees are due at Registration, before the posted Start time or the racer will be removed from the Start Order
- Pre-registration is recommended through the web site, or by contacting the Race Director directly
- Registration for weeknight races begins as soon as officials are ready and will remain open until inspection opens (usually around 7pm)
- Registration for weekend races is open 90 minutes before the scheduled start of the race

RACE CANCELLATION

This is not a cancellation POLICY per se, but GUIDELINES for Cancellation. CANCELLATIONS WILL ALWAYS BE DETERMINED BY THE RACE DIRECTOR.

The implications of cancelling need to be understood:

- It is VERY DIFFICULT to schedule races, much more to RE-schedule races.
- Cancelling erodes confidence in the program and our ability to execute, both in members eyes and more importantly in the eyes of the ski areas
- We cannot simply cancel a race without rescheduling as people buy packages based on a certain number of races they plan on attending

Also:

- Having Board Members or individual Members lobbying for a cancellation by trying to take count of who may come to the next race is a very damaging thing to do. Board Members need to respect the Race Director's ability to make this judgement call, as long as it is within the general guidelines we all agree to.
- Note that cancelling because "nobody will be there" is not at all a valid reason to cancel. Holding a race with only a few members at the race can be a good thing! It shows we are a dedicated group of racers and the ski areas know that they can count on us for not cancelling even in the worst conditions. The only reason having few members at a race should be a concern is if the ski areas are concerned about ticket revenue. But again, if they get 10 tickets sold on a day of crappy weather, I think they would be happy!

Guidelines for cancellation:

- -25 degree Fahrenheit wind chill (note that FIS regulations are -40; Junior USSA Races are never cancelled, regardless of weather)
- The ski area closes, or the lift that serves our run is closed or the run is inaccessible.
- Travel conditions are so ridiculously bad that it is SEVERELY dangerous to be driving. This means travel is REALLY, REALLY bad. Simply cancelling because people may be late due to the weather IS NOT A VALID REASON TO CANCEL.
- Cancellation can be made AT ANY TIME (but the earlier the better). This means up to an hour before the race, as rapid changes in weather may dictate this. It is the Member's responsibility to check to see if there is a cancellation, although we will make every effort to get the info out in some manner. Members must check the web site, their e-mail, and if there is still no indication, they should call the Race Director directly if still unsure.
- The Race Director makes the final decision on whether or not to cancel. ALL BOARD MEMBERS NEED TO SUPPORT THE DECISION.

What the Race Director needs to do in the event of a cancellation:

- The exact date/time the determination for cancelling needs to be logged so there is no lack of clarity about the cancellation.
- Ideally, a mass e-mail and a web site news item should be created stating that as of [date/time] race X has been cancelled. Reschedule date/time is TBD.
- The Race Director MUST HAVE HIS/HER PHONE ON AT ALL TIMES AND ANSWER CALLS. Since sending an e-mail and getting the web site updated immediately is not always possible, they must be available to make members aware of the cancellation via phone.
- We must work immediately to determine a reschedule date/time.

RACE CLASSES

Midwest Masters utilizes two Classes for the purposes of running races: Age Class and Ability Class. Age Classes are defined by the following groups based on the racer's age on December 31 of that race season:

- | | |
|----------------------|-----------------------|
| • Class 1 Ages 18-29 | • Class 8 Ages 60-64 |
| • Class 2 Ages 30-34 | • Class 9 Ages 65-69 |
| • Class 3 Ages 35-39 | • Class 10 Ages 70-74 |
| • Class 4 Ages 40-44 | • Class 11 Ages 75-79 |
| • Class 5 Ages 45-49 | • Class 12 Ages 80-84 |

- Class 6 Ages 50-54
- Class 7 Ages 55-59
- Class 13 Ages 85-89

Every year, Midwest Masters also creates Ability Classes that are meant to group skiers of the same ability based on a Seed List developed each year by the Race Director based on previous year's results. This allows racers to gauge their racing to those of the same ability, regardless of age or gender. Ability Classes are set for each event; therefore a member may belong to one Ability Class for SL, and another for GS. New members are assigned to Ability Classes as soon as enough results are recorded. The Ability Classes are defined as:

- Platinum A
- Gold A
- Silver A
- Bronze A
- Platinum B
- Gold B
- Silver B
- Bronze B

RUNNING ORDER

There are separate Run Order rules based on the Class method by which the race is run. The rules for generating Run Order are outlined in this section for each Class.

Age Class Run Order

Age Class Run Order follows - as closely as possible - USSA Masters rules for conducting a race. Note that Class Groups are not utilized due to the number of racers typically registered for MWM events.

Age Class Start Order is based on the following sort logic:

1. Age Classes 12-8 (descending); Gender (F then M); Ability Class Result Points for the event (ascending)
2. * New Members
3. Age Classes 7-1 (descending); Gender (F then M); Ability Class Result Points for the event (ascending)
4. Late Starts

Therefore, older members will always run first, and women will run before men within the Age Class. Within each Gender and Class combination, start order is based on current Ability Class result points for the given event in ascending order. Brand new members for whom this is their first race, will run after Age Class 8. Late Starts will ALWAYS run at the end of the race – no exceptions.

Age Class 2nd Run Order is based on the following logic:

1. Age Classes 12-8 (descending); Gender (F then M); Run 1 time (ascending)
2. * New Members
3. **Elite Class Run 1 time (descending) regardless of Age Class or Gender
4. Age Classes 7-1 (descending); Gender (F then M); Run 1 time (ascending)
5. All DNFs, DNSs, and DQs.

Ability Class Run Order

Ability Class Run Order is based on the maintenance of historical Result Points for all members for each event, or what is commonly called a "Seed List". The calculation of Race Points and Result Points (as well as corresponding Race Penalties for races) is outlined in the Scoring section below.

Ability Class Start Order is based on the following sort logic:

1. Age Class 12-8 (descending); Ability Class Result Points for the event (ascending)
2. * New Members
3. Ability Classes (**rotating); Ability Class Result Points for the event (ascending)
4. Late Starts

Therefore, older members will always run first – in Age Class order – regardless of their relationship to Ability Classes. New Members run next, and then the remaining Ability Classes run in rotating order. Ability Class gives no credence to Gender. Late Starts will ALWAYS run at the end of the race – no exceptions.

Ability Class 2nd Run Order is based on the following logic:

1. Age Classes 12-8 (descending); Run 1 time (ascending)
2. * New Members
3. **Elite Class Run 1 time (descending) regardless of Ability Class
4. Ability Classes (same rotating order as in run 1); Run 1 time (ascending)
5. All DNFs, DNSs, and DQs.

* Method TBD...

** Elite Class is determined based on the fastest 1st run times. Elite Class runs in the order of slowest to fastest run 1 time. The number of racers in the Elite Class is 15% of the total starting racers. As an example, the number of Elite Class racers would be the following based in the number of Starters:

# Starters	# Elite Class
20	3
25	4
30	5
35	5
40	6
45	7
50	8
55	8
60	9

*** At the beginning of the season when the schedule is set, the Race Director assigns a rotating order for Ability Classes. The Classes will run in the same order (PlatA, PlatB, GoldA, GoldB, etc...) however the Ability Class that runs first will rotate each race.

SCORING

Midwest Masters utilizes two methods for generating Run Orders and for scoring Results: Age Class and Ability Class. Age Class is the standard and official method used by USSA Masters to conduct races. The Age Class system must be used to determine Run Orders and Results for certain races. These races include (but are not limited to) the following:

- Western Region / Central Masters Championships
- Skier's Edge Central Master's Championships

“Scoring” could include any of the following types of Scores:

- Race Handicap
- Place Points (Age Class or Ability Class)
- Race Result
- Result Points or Result Profile

- Number of Starts
- Number of Finishes
- Number of Clean Finishes

Season ending point totals for any of the above Scores could be used to determine awards. The definition of season-ending awards is determined by the MWM Board of Directors in conjunction with the Race Director. However, all awards must be based on the Scores outlined in this section.

Any and all of these Scores will be generated for each race, and appended to a member's record throughout the season. The definition for each of these Scores is outlined below.

Race Handicap

A Race Handicap is a simple metric which will allow a racer to see their performance within the context of a single race. A Race Handicap for a given racer is determined based on the following formula:

$$H = (T^r / (T^{w1} + T^{w2})) * 100$$

Where:

H = Race Handicap

T^r = The Racer's total combined time for the race, in seconds

T^{w1} = The winning time of the 1st run, in seconds

T^{w2} = The winning time of the 2nd run, in seconds

The major shortcoming of this Score is that it does not adequately measure a racer's performance based in the level of competition encountered in different races. For example, if a racer receives a handicap of 110.00 in a race against former Olympians and ex-World Cup racers, and receives a 110.00 Handicap in a race against only fellow MWM racers, the aggregate of both results across races will not show the former 110.00 result as more indicative of a strong performance and the latter 110.00 indicative of typical performance (assuming this is the case for the latter race). The racer should be rewarded for a strong performance against tough competitors. The Handicap score will not illustrate this when averaged across races. It is, however, a decent indicator of performance within the context of a single race.

Place Points (Age Class or Ability Class)

Place Points are awarded to racers based on their place order within their corresponding Ability or Age Class. Place Points are awarded based on the "Old World Cup (top 15) Scoring" system:

Place	Points
1	25
2	20
3	15
4	12
5	11
6	10
7	9
8	8
9	7
10	6
11	5
12	4
13	3
14	2
15	1
>= 16	0

Points are assigned to a racer based on this gradient and aggregated throughout the season.

Race Result

A Race Result is calculated based on the following formula:

$$\text{Racer's Race Points} + \text{Race Penalty} = \text{Racer's Race Result (or Result Points)}$$

A "Race Result" is a point amount in the format 999.99 that a racer acquires once a race has been completed. Much like a Race Handicap, this result indicates the racer's performance in the given race. However, unlike Race Handicap, it takes into consideration the caliber of competition within the race via what is called the "Race Penalty". Therefore, as in the example used for Race Handicap above, a racer who scores a 110.00 handicap against former Olympians (a high-caliber field) may receive a Race Result of 24.73 in that race, where the Race Result in the race against his MWM comrades (an average caliber field) where he also scored a 110.00 Race Handicap only resulted in 97.22 Race Points.

While the winner of any MWM race is given zero (0.00) Race Points, a Race Penalty is calculated and added to each racer's points to produce the racer's Race Result for that event. The magnitude of the Race Penalty depends upon: 1) the Seed Points (current Race Points) of the best 5 racers who start the race, 2) the Seed Points of the best 5 racers among the top 10 finishers, and 3) whether the times of those five racers are clustered near the winner's time or relatively dispersed.

The scoring method allows the scoring of different races on different slopes and different days, each with different levels of competition, to be based on a common scale. In theory, every racer in a MWM event can compare themselves against the winner of the most recent Master's Nationals Group A event winner as the Seed List as defined at the start of the season is based off of Group A Nationals Result Points from the previous season.

Race Points:

The first step in determining a Race Result is to calculate individual Race Points for each racer. Much like a Race Handicap, Race Points are determined by comparing the winner's time and the individual racer's time. The formula for Race Points makes this comparison and produces points based on the ratio of the racer's time to the winner's time. The formula incorporates constants (what are referred to by USSA as "CM values") to make the points earned in the various disciplines more equal for purposes of combined event scoring and team selections. The formula for Race Points is the following:

$$P = (T^r / T^w - 1) * F$$

Where:

P = Race Points

T^r = The Racer's total combined time for the race, in seconds

T^w = The winning time for the race, in seconds

F = "CM" constants for the discipline:

DH	1350
SG	1030
GS	880
SL	610

For example, if the winning time in SL (F=610) were 98.36 seconds (T^w), a racer with a time of 102.58 seconds (T^r) would receive 26.17 Race Points (P). These same times produce race points of 57.92 in DH, 37.76 in GS, and 44.19 in SG.

Race Penalty:

The next step in determining Race Results for racers in a race is to determine the “Race Penalty” for a given race. This number essentially represents the caliber of the field in a given race. The lower the Race Penalty, the more competitive the field is. Generally, lower Race Penalties attract racers as low Penalties also mean an opportunity to lower your Result Points.

In calculating the Race Penalty for a race, the results (times) are listed in ascending order for everyone who competed. Even if men and women competitors of different Ability or Age Classes participated, a single result list is determined. The Race Penalty is calculated as follows:

- Using the most recent Member Points list for the event, determine which five racers on the Start List have the best Result Points in the particular discipline. Add these points (see “B” below):

Racer on Start List	Current Member Points
MANCUSO, Julia	3.69
KOZNICK, Kristina	9.28
SCHLEPER, Sarah	9.92
KELLEY, Jessica	18.50
RICHARDSON, Kaylin	19.37
	B= 60.76

- Again using the most recent Member Points, determine which five of the top ten placing racers have the best points in the discipline. Add the Race Points of these five racers (see “A” below). Add together the Race Points of these five racers then subtract the best points of those racers finishing in the top ten in the race (see “C” below):

Overall Finish Order	Best 10 Finishers	Current Member Points	Pts of Best 5	Race Pts of Best 5
1	SCHLEPER, Sarah	9.92	9.92	0.00
2	KOZNICK, Kristina	9.28	9.28	1.63
3	KILDOW, Lindsey	20.35	20.35	3.1
4	COOK, Stacey	34.92		
5	MIELKE, Kristin	40.18		
6	CICCONE, Caitlin	29.77	29.77	8.04
7	ROSS, Lauren	35.92		
8	KELLEHER, Keely Blair	46.03		
9	RICHARDSON, Kaylin	19.37	19.37	11.07
10	LUDLOW, Libby	34.55		
			A= 88.69	C= 23.84

- Add the total of A and B then subtract C; divide the result by 10, rounding to 100th of a point. The formula is therefore:

$$\text{Race Penalty} = (A + B - C) / 10$$

Therefore, in this example: $(88.69 + 60.76 - 22.84) / 10 = 12.561$ or 12.56

Result Points or Point Profile

Race Results are also calculated – and maintained separately – for each event. A Racer’s two best (lowest) results for a given event are averaged to determine a racer’s current “Result Points” for a given event. The list of current “Result Points” for a given racer is often called the racer’s “Point Profile”.

It is important to note that your Race Points can never go up as they are simply the average of your two best results, so you have nothing to lose when competing against tougher competition – only lower points to gain if you ski well!

Number of Starts

The number of starts is simply the number of races the racer has started and actually left the starting gate, regardless of the result of either run.

Number of Finishes

The number of finishes is simply the number of races a racer has finished without Disqualifying.

Number of Clean Finishes

The number of “clean” finishes is simply the number of finishes excluding any races where the racer finished legally, but hiked or skated around a gate. This metric is primarily used only for Seed List definition at the beginning of the next Season (for Seeding purposes, it is best to only include races for racers where they received a good result as to not skew averages).

COURSE RULES

Each racer's bib must be visible at all times during inspection and each run. If a racer forgets a bib, the racer must see Race Registration for a temporary paper bib. Each racer is entitled to only one run on each course unless a "rerun" is authorized by the Race Officials. A racer who has clearly disqualified must not continue further through the gates. Loss of a ski prior to the third to last gate (the finish line is a gate) is automatically disqualified. After that gate, racer may complete the course on one ski. Once the start wand has been tripped after the "GO" command, the racer is deemed to have started. If the racer leaves one or both skis in the start, the racer will receive a rerun.

QUALIFYING PROCESS FOR MASTERS NATIONALS

Qualifying will be based on a year round scoring system. Quota slots will be selected according to World Cup Points earned within each age group, only if the age group has 3 or more participants. If the age group only has one participant, 21 points will be awarded. If the age group only has two participants, 21 points will be awarded to the first place finisher and 16 points to the second place finisher. Tie breaking will be based on the number of races in which individuals have participated. National participants from previous years Masters Nationals events (SG, GS, & SL only / not Speed Nationals) will be able to use their points earned in addition. Qualifying races will consist of one weekend. We will count your three best race results, regardless of discipline. We will hold a total of 2-SL, 2-GS and 2-SG races, 6 qualifying races in all. The Central Masters Committee will determine future race sites. The qualifying races will be listed on the Midwest Masters race series schedule.

Automatics: You may be an automatic qualifier if you receive a medal at the previous years Masters Nationals. This will carry over to next year's Nationals only.

Discretionary Picks for Masters Nationals:

Up to 10% of the quota slots may be awarded discretionary picks of the Division Chairperson. Selection will be based on place points (if available) or by abilities. Any USSA Masters member that wants to go to Nationals not qualifying under quota may be put on a wait list, by contacting the Central Coordinator. If you do not contact, you will not be put on the wait list. If you do not qualify under quota, don't worry, you have a very good chance of going from the wait list. Only current USSA members will be calculated in for qualification. Non-members can participate with a Temporary USSA Membership and will be calculated in for qualification, when they become a full USSA Masters Member.

Note: All Masters Racers wanting to participate in the Masters Nationals need to participate in the National Qualifier.