

Snowboard / Freeski FIS World Cup

Halfpipe (HP) Venue Requirements

Halfpipe Building Principles

The preparation of the HP is a key point and has to be taken care of from the beginning to the end and will provide long and performing riding sessions as needed with a high number of riders.

It can be done in different ways according to where the pipe location is and where all the snow is. The main goal is to create consistent and packed snow conditions from the bottom of both walls to the top as well as through their depth. During this procedure there can be an optimisation of working hours and quantity of snow needed. Experts must be involved.

The Ideal snow type to use during preparation, accumulation and construction of the walls is dryer man made snow in a way to avoid whilst pushing the formation of chunk's, wet balls, air pockets, changes of consistency and type all through the length of the walls, as well as in their depths.

In case of snowfalls during the construction procedures, the new snow has to be moved around, mixed or removed.

The decks have to be at the same height and length (laser systems can be useful). Copings have to be straight and parallel to each other.

The depth of the walls has to be enough to go through all training and competition days without risking touching ground and still having a good margin > 1 meter.

The flat has to have a round shape in order to not create unexpected bumps and changes of pitches.

Measurements for World cup Standards:

- Height of walls: 22ft wall = 6.7 meters,
- Pitch of Halfpipe measured through fall line of the flat: 17° to 19°,
- Length of rideable wall >150 meters
- Width from coping to coping 19-21m. (tighter if less steep, wider if steeper)
- Depth of snow in the bottom of the pipe > 50cm.
- Width of decks > 8 meters.

Further details and specs on Halfpipe technical drawing.

Preparations - Staff / Material	# of People
2 snow-cats for around 10-15 days (including competition days) 1 with HP-preparation machine (with winch) 1/ 2 to push out the snow for the flat	2 snow cat driver – no regular snow cat Shift
A FIS approved 22Ft HP grooming (finishing) machine is required at all WC venues and spare parts	1 Experienced HP Shaper
Shapers/Builders – needed during HP building (approx. 3-4 days) not competition days.	6 with shovels, chain saw, rope (to mark a straight coping line)

Training days (2) - Staff / Material	# of People
Technical HP needs	
2 snow-cats 1 HP-preparation machine incl. winch 1 to push out the snow for the flat (early – depending on weather, etc.)	1-2 snow cat driver – no regular snow cat shift
1 snow cat with blower to remove new snow (suggested not required)	
3 x 20 litre colour pumps (blue) + 1 small red colour	3 skilled skiers with twin tips.
Chemicals 200kg at least with park monkey, buckets (the amount depend on what kind of chemical is provided !!)	3 knowledged people in using chemicals
Course Maintenance	6 with shaping tools (snowpark rakes shovels and crampons), hand snowblower (2)
Training - competition needs	
Starter	1
Chief of Competition/HP (in Jury)	1
Slippers	15 experienced skiers minimum (ideally 10 skiers and 5 snowboarders)
Security – Crowd Control	2 each side of the decks
Exit-Gate control	1
Drinking water	Hot tea and cold water (without gas) during training and competition for athletes.
Communication Radio's (headset for start)	OC provides 10 radios to run qualification (according to FIS radio list). OC needs extra radios for internal communication.
Medical needs	
Medical Person - Doctor - SOS People	1 minimum always at start–either on skis or skidoo 4 two groups of 2 nurses/first aid staff+ sledge (1 crew if needed leaves, 1 stays still at start)

1 skidoo	1 dedicated driver
Infrastructure needs	
Building Crew (separate Crew)	4-6 to help building TV-platforms, etc.
Miscellaneous Staff – fence	2 control fence is in place
Skidoos incl. Driver (whole day)	1-2 depending on lift-situation
Judges stand and Data building responsible	1

Competition days:(Qualifications Semi-finals, finals) Staff / Material	# of People
Technical HP needs	
2 snow-cats 1 HP-preparation machine incl. winch 1 to push out the snow for the flat (early – depending on weather, etc.)	1-2 snow cat driver – no regular snow cat Shift
snow blower to remove new snow (suggested not required)	1
3 x 20 litre colour pumps (blu) + 1 small red	3 skilled skiers with twin tips.
Chemicals 200kg at least with park monkey, buckets	3 knowledged people in using chemicals
Course Maintenance	7 with shaping tools
Training - competition needs	
Starter	1
Assistant Starter	1
Chief of Competition/HP (in Jury)	1
Scores/Results Board - Finish	2 to write down times/ranks–radios OC
- Start	1 to write down times/ranks-radios OC
Slippers	15 experienced skiers minimum (ideally 10 skiers and 5 snowboarders)
Runner	2 1 copy for results, 1 for press
Exit-Gate control	1
Accreditation control	4-6 around the finish area – depending on different zones and spectators
Security – Crowd Control	2 each side of the decks
Exit-Gate control	1
Doping Control	12 6 women and 6 men (chaperones) only for finals
Skidoos	3 for taking riders back to start during finals if adequate lift not available
Drinking water	Hot tea and cold water (without gas) during training and competition for competitors.
Communication Radio's (headset for start) OC needs extra radios for internal communication.	OC provides 14 radios to run the competition (according to FIS radio list).
Medical needs	
Medical Person - Doctor - SOS People	1 minimum always at start–either on skis or skidoo * 1 extra in case of live TV
1 skidoo	5 two groups of 2 nurses/first aid staff+1 Dedicated driver

Infrastructure needs	
Building Crew (separate Crew)	4-6 to help building TV-platforms, etc.
Miscellaneous Staff – fence	2 control fence is in place
Skidoos incl. Driver (whole day)	1-2 depending on lift-situation
Judges stand and Data building responsible	1

Halfpipe Infrastructure needs

Fencing / Padding	1 meter high (C fence) crowd control metal fence – in special cases only crowd control fence (each side of the pipe) top to bottom incl. start/finish area, set at 3 meters from coping (edge of pipe). Banner fence (sponsor banners) set at 2.5 meters from coping. Other safety nets and padding (TV-towers, etc.) as per required by race jury.
Judges Stand	<p>Out of scaffolding 36square meters (6 x 6 meters) or Container (6 x 6 meters) and min 2 meters inside height – completely closed (on three sides) and water resistant – with tables and chairs for 8 people – aligned to the center of the pipe around 20-25 meters behind the finish-line. Heaters and power for computer (separate electric circuit) are required.</p> <p>If the Judges stand is not place at the bottom of the HP in direct line site (which is an option) then e video feed needs to be provided to the Judges. Such video feed needs to filmed from the bottom center of the HP with a camera that can zoom up to the start and film the competitor during his/her performance keeping in the shot the coping all the time). In the judges stand minimum 3 screens 32 inch big. More details will be shared once on site.</p>
Official Notice Board Scoreboard	<p>A suitable board in the finish area (marked as “OFFICIAL NOTICE BOARD) - close to the exit gate (minimum 2 x 2 meters) to post results, scores, jury decisions, etc. and to write down scores/rank during Qualification and Finals.</p> <p>A suitable board in the start area (minimum 1 x 2 meters) to post official results, jury decisions, information and to write down scores during Qualifications and Finals.</p>
Start Tent	Available for competitors - minimum 5 x 5 meters, closed, secured and heated - (restaurant within 100m is adequate)
Toilets	1 toilet located close (100m) to start area (portable toilets). 1 toilet located close to judges stand.
Sound System Sound System Speaker	<p>Specifications as per sound company and local situation – during competition not to loud that we can run the event.</p> <p>Specifications as per sound company and local situation For all training- and competition days music is required.</p> <p>English is required and respective national language – two speakers are recommended (also for training, qualifications and awards) who</p>

DJ	are aware of the sports ins and outs. Musical selection depends on the audience and local habits, but should be related to snowboard
Data Building	A heated lockable building/container with power (separate electric circuit) and tables and chairs for 3 people (minimum 10 square meters) with windows, located adjacent to the judges stand is required. There are cables from this container to the judges stand and to the TV compound. FIS data processing company will provide more details.
Internet Connection	High speed, separate and stable Internet connection (preferable wired connection) required for live scoring data transfer!
Awards	A stage (5x4 meter) beside the finish area (where TV cameras have easy access) with a table for the prizes. Before a corridor with 1 meter crowd control metal fence for press/TV/photographers..
Power	Will be needed at: <ul style="list-style-type: none"> - Start - Data Building - Speaker/DJ - Finish Area - Award-Stage - both roll out decks

FIS-Data processing, timing and venue-setup will contact OC directly for additional transport and staffing needs.

Job Descriptions

Chief of Competition	Is responsible for all activities that rotate around the competition and in direct connection and part of the Jury as wells as all staff on field
Chief of Halfpipe	Is responsible for all technical aspects and working procedures on the field of play in direct contact with slippers, color crew, maintenance crew
Starter	Has to be available at the start 30 minutes prior every official moment and opens and closes the hp according to needs. Controls the start zone and the flow of the riders. During qualifications, semi-finals and finals he is in radio contact with the jury and when judges, TV and Contest Director give the signal to send the next rider he will do so.
Assistant Starter	Has to be available at the start 30 minutes prior every official moment and assists the starter in is duties as well as pre calling and lining up the athletes according to the start order.

Runners	Have to be available during competition moments in order to collect from data staff results and distribute them on the course (start, Contest Director, official notice boards), TV, press compounds.
Slippers	Have to be available at least 2 hours prior official training moments and during the whole execution of the event. They will follow the instructions of the chief of HP, Contest Director or Technical Advisor.
Maintenance	Crew dedicate in taking specific care of the HP during all moments with assisting the technical advisor or chief of HP.
Color Crew	They will be available at least 90 minutes prior and during all official moments have to color pipe according to needs and instructions of chief of HP.
Exit Gate Control	During competition moments has to be located at the exit gate and control that nobody gets in to the arrival area and holds and directs riders in front of back drop for TV shots when needed.
Accreditation Control	Control the designated areas and the access to them through accreditation identification.
Security Control / Crowd Control	Stay in the filed of play and make sure that non authorised people get in and in case direct them out of the area.
Doping Control	Chaperones have to manage and control the designated athletes for doping control and to accompany them to the doping control facility.
Score Board Writers	Have to write done scores on official notice boards both at start and finish area
Award Team	It sets up the awards ceremony and with OC runs them

Agreed by: _____ Date: _____
Resort/OC Representative

Agreed by: _____ Date: _____
FIS Inspector