

Snow Production

Protection of the Pumps and Nozzles of Snow Guns



Customer:

Okuibuki, a family snow resort situated one hour's drive from Nagoya has the Kansai's biggest trails. As supplement to natural snow, the resort uses snow guns to produce the additional required artificial snow.

Background:

The pump station feeds the snow guns, which comprises of a water tank, pumps and sock filters.

To filter the necessary river water, the customer used 21 single use pairs of sock filters. The replacement of the socks, which had to take place several times a week, was a complicated and burdensome manual process. Moreover, there was no automated clogging control system, which had a negative impact on the functionality of the snow cannons.

Description of the solution:

The sock filters were replaced by one single self-cleaning BOLLFILTER aquaBoll® equipped with candle elements offering a 100 µm grade of filtration.

From that date onwards, the filtration process has been fully automated. The filter candle elements are backflushed automatically and do not need to be changed. The maintenance required of the filtration process has been considerably reduced.

Advantages and added value for the customer:

By using the BOLLFILTER automatic aquaBoll®, the Okuibuki Snow Resort gains the following advantages:

- Reduction of maintenance costs
- Energy savings (due to a lower differential pressure, the amount of energy needed for operating the pumps is lower)
- The failure rate of the snow cannons has been reduced
- The snow quality has been improved

Customer: Okuibuki Snow Resort

System:

Filter: aquaBoll® size 419 DN200
Flow rate: 300 m³/h
Grade of filtration: 100 µm
Capacity: 245 l/s (882 m³/h)



Snow gun



Filter system in the pump station



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