

2024



International Ropeway Review



OFFICIAL ORGAN OF OITAF
USA + CANADA SPECIAL

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Steamboat Ski Resort: “The Monster” has taken up its duties

ISR INTERVIEW

NSAA president Kelly Pawlak:
“Winter is still king”

EVENT

OITAF Ropeway Congress 2024
in Vancouver

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MAG. CLAUDIA MANTONA
Editor-in-chief**DEAR READERS,**

A few days ago, I got back from *Mountain Planet*, the International Trade Show for Mountain Development, which was held in Grenoble (F) from April 16 to 18. ISR also had a stand there and was proud to present its special trade show edition. The mood at the event was very good, and the number of visitors this year was significantly higher and more international than at the last *Mountain Planet* in 2022.

One reason for this is doubtless the fact that most European ski resorts had a "satisfactory" or "very good" winter season in 2023/24. Thanks to the very early arrival of abundant first snowfalls in November, the winter season got off to a record-breaking start in many winter resorts. This trend continued until January. But then a much too warm February and March coupled with some freak weather dampened the initial euphoria, and not even this year's early date for Easter at the end of March and beginning of April was enough to fully compensate for the losses. Lower-lying ski resorts naturally suffered the most, while winter resorts at higher altitudes were among the winners. In Switzerland especially (e.g. in the Jungfrau Region and Gstaad), there was a welcome increase in the number of winter sports visitors from the USA. There is still a strong spirit of optimism in the US ski resorts, and 2023 was a year of extensive capital spending, with 149 ropeway installations built or refurbished.

For this ISR country special, our editor Thomas Schweighofer spoke to Kelly Pawlak, President of the NSAA, about the economic strength of American ski areas, their investments, all-time records, and the importance of a four-season offer (p. 8f). This year, attendees at the *NSAA National Convention & Tradeshow*, which will be held in Frisco (Texas) from May 21 to 24, can once again look forward to a highly interesting program. As always, this major industry event will be a platform for sharing knowledge and ideas, and general networking. An ISR team will also be present with a special number.

OITAF, the International Organization for Transportation by Rope, is celebrating a comeback this year after the last congress in Bolzano (ITA) in 2017 and a one-year postponement caused by the coronavirus pandemic: The 12th *OITAF Congress* will take place in Vancouver, Canada, from June 17 to 21, 2024, under the motto "Ropeways – Smart Transport Solutions". Registrations for the event are still welcome. Turn to page 6 for all the details.

I would like to thank everyone who has contributed to this issue of ISR and wish you, dear readers, an interesting read with our country special.

Best wishes

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In addition to the expert presentations, the program of excursions in British Columbia is an attraction in its own right and includes such destination as Grouse Mountain.

Top speakers for the OITAF Ropeway Congress 2024

OITAF For the 12th International Conference on Transportation by Rope to be held on June 17 - 21 in Vancouver, Canada, the International Ropeway Organization has prepared a varied and highly interesting program with noted experts in research and practice.

The main event organized by OITAF – the global organization that brings together all persons, institutions, authorities, manufacturers and operators with an interest in ropeways – is celebrating a comeback after the last congress in Bolzano (ITA) held in 2017 and a one-year postponement caused by the Corona pandemic: The 12th OITAF Congress is scheduled for June 17 to 21, 2024, with the Hyatt Regency Hotel in Vancouver, Canada as the venue. The overall topics of the congress, which is being held under the motto *Ropeways – Smart Transport Solutions*, are *Ropeway developments in urban and tourist areas*, *Ropeway operation*, *Ropeway technology – new developments* and *Dimensions of sustainability*. Presentations will be given in English or French, with simultaneous translation into the other language plus German and Spanish. The social program is in itself a big attraction and includes excursions to the four-season destinations Grouse Mountain and Whistler Mountain/Blackcomb. There is also an attractive program for accompanying persons with an excursion to Granville Island and a day trip to Victoria including a visit to Butchart Gardens.

Registrations for the OITAF Congress are still welcome: register.oitaf2024.com

The complete program and further information is here: oitaf2024.com/program-2/

AGENDA

OITAF Ropeway Congress 2024

Ropeways – Smart Transport Solutions

17 – 21 June 2024, Vancouver (CAN)



Monday, June 17

10:00 am – 1:00 pm	Come together in downtown Vancouver – city tour
5:00 pm – 10:00 pm	Registration of participants
7:00 pm – 10:00 pm	Welcome buffet

Tuesday, June 18

Session 1 Development of ropeways in the urban and tourist sector

9:00 am	Opening // EN Jörg Schröttner (President OITAF)
9:15 am	Greetings
9:30 am	The transport capacity of a cable car system in public transportation // EN Klaus Erharter (Technical Director Leitner), Paul Abed (Director of Mexitelefericos S.A. de C.V.)
10:00 am	Burnaby Mountain Gondola: making the rapid transit connection // EN Holly Foxcroft (Lead Planner TransLink)
10:20 am	Toulouse's cable car: focus on best practice 2 years after commissioning // FR Patrick Vial (Project Director of Téléo – now Project Manager of the future third metro line in Toulouse)
10:40 am	Discussion
11:00 am	Coffee break
11:25 am	Brest, the 1st urban ropeway in France // FR Victor Antonio (Mobilities Director)
11:45 am	Transit planning in a context of inequality: the case of Mexico City's Cablebús Network – 10 million people each day // EN Andrés Lajous (Mobility Secretary, CDMX)
12:10 pm	Discussion
12:30 pm	Lunch break

Session 2 Operation of ropeways

2:00 pm	Get the best out of your ropes // EN Sven Winter (CEO ROTEC GmbH, President OITAF Study Committee II)
2:20 pm	Digital customer trainings: know-how anywhere and anytime // EN Philip Oberdorfer (Digital Services Customer Support Doppelmayr Seilbahnen GmbH)
2:40 pm	Operations and maintenance (O&M): a successful long-term approach in managing clients' assets // EN Javier Rosales (Operation & Maintenance Manager/ Doha, Qatar; Doppelmayr Cable Car GmbH)
3:00 pm	Opportunities and threats of digitalisation // EN Marco Zraggen (CEO Sisag)
3:20 pm	Discussion
3:40 pm	Coffee break

4:00 pm	Operation and maintenance of a multi-brand cable car // EN Diego Scofano (Technical Director Grupo Iter – Rio de Janeiro)
4:20 pm	LIFE ropeway, the innovative approach to increase the sustainability of ropeways and their operation throughout their entire lifecycle // EN Michael Fauche (New Market & Strategy Dir. Poma)
4:40 pm	Great place to work talent journey // EN Benny Pregenzer (CEO Fisser Bergbahnen GmbH)
5:00 pm	Ropeways – a leader in safe accessible transportation // EN John Kamb (Ropeway Engineer, US Forest Service)
5:20 pm	Metrocable Line K – Keys to keeping the first urban cable car in operation after 20 years, 135,000 hours and 260 million passengers mobilized // EN Jorge Alberto (Ropeways Manager), Ramos Lopez (Metro de Medellín)
5:40 pm	E-mobility at the +1 level in public transport // EN Dominik Berndt (CEO an initiator Cable Car World Ltd.)
5:50 pm	Discussion
6:10 pm	Close
7:00 pm – 10:00 pm	Dinner

Wednesday, June 19

Session 3 Ropeway technology, new developments

9:00 am	Proposal for a tool to help verify the safety level of monocable aerial ropeways // FR Gaetan Rioult (Chief Engineer, Head of Department for Ropeway Installations STRMTG France, President OITAF Study Committee I)
9:25 am	Autonomous mobility with ropeways – the next generation of modern transportation // EN Michael Mathis (Head of Technical Division Doppelmayer Seilbahnen GmbH), Martin Oberhammer (CEO Silvretta Montafon Holding GmbH)
9:55 am	Weather challenges in ropeway operations & maintenance // EN Tom Scully (Risk Control Consultant, President OITAF-NACS)
10:15 am	Discussion
10:35 am	Coffee break
11:00 am	Fire risk under ropeways: a new approach to fly-over difficulties // FR Thibault Chatelus (Ropeway Engineer at STRMTG/French supervisory authority)
11:20 am	The intermodal transport system ConnX // EN Günther Tschinkel (Head of electrical department Leitner ropeways)
11:45 am	Cybersafety in the sky: unveiling the crucial link between ropeway safety and cybersecurity // EN Giorgio Pizzi (Italian Ministry of Infrastructure and Transport – Director of Ropeways, Local Railways and Digitization of Local Public Transport Division)
12:10 pm	Discussion
12:30 pm	Lunch break

Session 4 Dimensions of sustainability

2:00 pm	The transformation of the funicular system since 1888: the Peak Tram // EN Samuel Lee (Director of Engineering Peak Tramways Company Limited, Hong Kong)
2:15 pm	Adaptation strategies of ropeway companies in Switzerland due to climate change // EN Berno Stoffel (Director Swiss Cable Car Association), Benedicta Aregger (Vice Direktor Swiss Cable Car Association)
2:35 pm	Development and optimization of snowmaking systems for better resource management // EN Franco Torretta (Technical Director Monterosa ski resort in Italy, President of the Italian National Association of Ropeway Technicians A.N.I.T.I.F.)
2:55 pm	Empirical data on technical snowmaking: greener and more sustainable than assumed // EN Günther Aigner (CEO Zukunft Skisport)
3:15 pm	Energy storage system for ropeways // EN Stefan Gassmann (Head of Sales Frey AG)
3:30 pm	Coffee break
3:55 pm	Tourist sites and the environment // EN Gunther Suetter (President OITAF Study Committee VII)
4:15 pm	New strategy for ski resorts: public transport as the future essential service // EN Sophia Oberjakober (CEO Mobilitätskonsortium), Andreas Dorfmann (President Mobilitätskonsortium, CEO Kronplatz Group)
4:35 pm	The new generation of bicable ropeways, the economic link between monocable and 3S // EN Dominic Bosio (Leitner ropeways)
4:55 pm	Discussion
5:15 pm	Organizational issues for the program of visits
5:25 pm	Presentation of Grouse Mountain Resort // EN Speaker tba./Grouse Mountain
5:50 pm	Closing words
6:00 pm	Close
8:00 – 12:00 pm	Gala dinner

SOCIAL PROGRAM

Thursday, June 20

10:45 am – 12:30 pm	Visits to Grouse Mountain
2:15 – 4:15 pm	Capilano Suspension Bridge (optional: direct bus to the Hyatt Hotel Vancouver)

Friday, June 21

10:15 am – 12:30 pm	Blackcomb, cable car ride, crossing Peak 2 Peak
12:30 – 1:15 pm	Presentation of 4-season operation of Whistler Mountain at the Roundhouse Lodge
4:00 – 6:00 pm	Sea to Sky Gondola, Squamish (optional: direct bus to the Hyatt Hotel Vancouver)

#Errors and omissions excepted.



According to NSAA President Kelly Pawlak, the 2023-24 winter season was “a roller coaster” for US ski resorts. Positive results were achieved with offers like the *Epic Pass*, which provides affordable, unlimited access to multiple ski resorts (pictured: Vail Mountain).

Winter is still king

NATIONAL SKI AREA ASSOCIATION Kelly Pawlak, President of the NSAA, speaks in the ISR Interview about the economic strength of American ski areas, their investments, all-time records, and the importance of a four-season offer.



KELLY PAWLAK
President and CEO of the National Ski Areas Association (NSAA)

ISR: Kelly, what are the key points on the NSAA's agenda for the coming years? In which areas do you want to achieve even more for the industry?

Kelly Pawlak: Our key areas of focus include safety, with an emphasis on lift safety: We are focused on training the next generation of lift education trainers and offering lift mechanic education. Furthermore sustainability, because we are focused on climate action and advocacy and helping ski areas inventory their water and energy usage related to snowmaking. Another important topic is diversity, equity, and inclusion. We are very focused on providing free quality DEI education to ski areas so they can foster more inclusive workspaces and mountains.

ISR: How economically healthy is the industry in North America?

Kelly Pawlak: The US ski industry is very healthy as indicated

by the skier visits, for example. The last two years have set industry records. An all-time record was also set last year for the number of unique participants, while revenue per skier visit is on a ten-year upward trend. Ski areas are investing an all-time high on capital projects that enhance the guest experience, especially in the area of new and upgraded lifts. 149 new or modernized lifts were added last year alone!

ISR: How well have the pandemic years and times of higher inflation and energy prices been absorbed in the US?

Kelly Pawlak: In the US, the pandemic was a catalyst for renewed outdoor recreation interest. It helped boost ski industry numbers, and we have started to see some leveling off, especially midweek visits.

ISR: Have guests' needs changed in recent years?

Kelly Pawlak: More guests are taking advantage of multi-resort season pass and frequency products. This provides guests with a relatively inexpensive way to gain access to a variety of ski areas in different regions of the country, and we are seeing increased mobility in participants. Guests will “chase the snow” and this behavior contributes to shorter booking windows.

ISR: What preliminary conclusions can you draw about the winter season? How snowy was the winter and what kind of feedback have you received from the ski resorts?

Kelly Pawlak: The 2023-24 season has been described by operators as a roller coaster. Western resorts have done bet-



Visitors are enthusiastic about new and improved offers at ski resorts in the USA. Pictured: Boyne Mountain Resort in Northern Michigan.

ter than the east coast, and parts of the Midwest have had a difficult year. Snow has been most plentiful in the west, especially in the Sierras, California, and Utah.

ISR: How well are the mountain resorts geared up for the four-season offer, and how important is summer and the off seasons for business?

Kelly Pawlak: 13% of US revenues are attributable to summer business. Winter is still king, but summer plays an important role in helping resorts to offer the workforce year-round opportunities. Golf, mountain biking, weddings and scenic chair-lift rides are a few of the most popular summer offerings.

ISR: If you don't invest, you stand still: Which ropeways, attractions or facilities having their first season this winter are worth highlighting?

Kelly Pawlak: With approximately 150 new or upgraded lifts this year, they are all standouts. Each ski area has a unique personality, and new lifts are always top on the customer and ski area wish list. Boyne Resorts stands out for their impressive lift installations. For years now they have been installing

state of the art lifts, and this year is no different. Boyne Resorts has installed a number of the Doppelmayr *D-Line* bubble chairs, including *The Disciples 8* at Boyne Mountain in 2022-23, *Crest 6* at Brighton (UT), *Camelot 6* at The Highlands (MI), *Barker 6* at Sunday River (ME), and the *Lone Peak Tram* at Big Sky (MT). Boyne Resorts was busy! Some other impressive lift installations include the *Wild Blue Gondola* at Steamboat (CO), a Doppelmayr *D-Line*, and the long-awaited *Berman Express* at Keystone (CO), a 6-pack Leitner Poma. Just to name a few!

ISR: Which upcoming investments for 2024 stand out?

Kelly Pawlak: Like the last few years, loading conveyors, bubbles and heated seats are becoming more common guest experience enhancers. The *Madison 8* and *One and Only Tram* at Big Sky (MT) are standouts. Deer Valley (UT) is planning to install four lifts, and Powder Mountain (UT) is planning to install three new lifts. Homewood (CA) plans to install a *D-Line* gondola by Doppelmayr, and even our one and only ski area in Tennessee is installing two new 4-seater lifts.

ISR: Thank you for the interview!

Thomas Schweighofer

The interview was conducted via e-mail in early April 2024.

EVENT INFORMATION

The NSAA's National Convention and Tradeshow is being held on May 21-24 at the OMNI PGA Frisco Resort in Texas. A very full program covering future strategies, sustainability, legal issues, add-on offerings, and much more will once again include an awards ceremony and a golf tournament. For online information on the event, go to:

www.nsaa.org/NSAA/Events/National_Convention/National_Convention.aspx

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Whether the prospects remain positive and where the challenges lie were the subject of interviews recently conducted by ISR with the chiefs of the ropeway associations in Switzerland, Germany, South Tyrol and Austria.

Fit for the future?

INDUSTRY TRENDS ISR asked the chiefs of the ropeway associations in the German-speaking countries of the Alps what answers the industry has to such challenges as today's labor shortages, climate change and economic crises.



BERNO STOFFEL
Director of the SBS
(Swiss Ropeway
Association)

ISR: Herr Stoffel, have the markets changed in the last few years? For which guest groups or markets do you see positive trends?

Berno Stoffel: During the coronavirus pandemic, Switzerland was the only country that did not impose a lockdown in the winter of 2020/21 and did not introduce a mandatory vaccination certificate in 2021/22. That resulted in an 8% increase in Switzerland's share of the European market. What we currently see is that the Swiss have remained loyal to their domestic vacation destinations, while the European market has recovered, and market shares are returning to

around their previous levels. The transatlantic market is developing particularly well, both in winter and summer. And we are seeing very positive trends in the excursion business, particularly with regard to the Asian market.

ISR: The SBS is promoting relevant training schemes under the banner *Alpine Tech Heroes*. What do you hope to gain from the campaign?

Berno Stoffel: The apprenticeships in Ropeway Mechatronics and Ropeway Operations are excellent entry points for a career in the ropeway industry, and yet not so many people are aware of these opportunities. With our trainee campaign, we want to change this situation. In addition, around a third of the technical managers of Switzerland's ropeways will be retiring in the next five years. These people are certified ropeway specialists and have usually completed an apprenticeship in ropeway mechatronics. As a result, there is increasing pressure to train more ropeway mechatronics engineers and then technical managers to fill the upcoming gaps.

ISR: Ropeway companies have long been implementing climate protection measures. How can this commitment to the environment be better communicated to the public?

Berno Stoffel: It is true that ropeway operators are doing a lot to protect the environment and mitigate climate change and are making significant contributions in this field. Unfortunately, there is little public awareness of these efforts, and ropeways tend to have a negative image in terms of environmental impact. This doubtless has to do with the conflicting goals of land use and environmental protection. We are currently working on a broad survey in which ropeways can report their positive initiatives so that we can then collect, process and communicate them.

ISR: How well have the ropeway companies weathered the crises of the last few years?

Berno Stoffel: It is well known that political, climatic and economic crises have negative impacts on tourism. Switzerland's ropeways have shown time and again that they are resilient – be it the context of the strong Swiss franc, the coronavirus pandemic, the rise in electricity prices or the threat of power shortages like last winter. But they are also innovative – as demonstrated by the projects that were nominated for and won the *Swiss Mountain Award* last year.



MATTHIAS STAUCH
Chairman of the
Board at the VDS
(German Ropeway
Association)

ISR: Herr Stauch, there is plenty of interest in winter sports and the mountain experience, but this cannot be taken for granted. What can the ropeway operators do to maintain this level of demand?

Matthias Stauch: Our job is to focus more on the positive emotions associated with skiing. And we need to get more children and young people back on the slopes – my generation learned to ski on the village lift. We need more ski camps again. Many enterprising ski schools are working hard to address this issue and communicate the joys of sport. Unfortunately an absurd discussion is taking place, especially in the cities, about whether skiing is ethically defensible in the present situation. The winter sports bashing that is now so common is something we must counter resolutely and provide the public with factual information.

ISR: The VDS argues that ropeways are the “allies of nature and the climate” with an optimum “social, economic and ecological footprint”. But are there any ways in which the industry could still adjust?

Matthias Stauch: This is a subject that we take very seriously indeed. One of the keys is doubtless the question of the mode of travel to and from the resorts. To encourage rail travel, for example, we have developed combined tickets in cooperation with Deutsche Bahn. Grooming the slopes is another issue: Ropeway operators are making increasing use of HVO (hydrotreated vegetable oil) and e-fuels but are coming up against capacity constraints. The issue of power generation also needs to be addressed. Austria, for example, is ahead of Germany when it comes to hydropower. Approval procedures here also need to be streamlined. So ropeways still have significant opportunities for reducing their ecological footprint. With regard to snowmaking, too, progress continues to be made in terms of system optimization. Individual measures such as eliminating single-use packaging in the hospitality trade are also relevant. We must continue to make adjustments in all areas. So yes, there are many ways in which the industry can continue to move forward.

ISR: What role can and should urban ropeways play in the future?

Matthias Stauch: Here again people sometimes have strange

reservations: Some are afraid that passengers on an urban ropeway will be able to see into their bedrooms or that the townscape will be cluttered with towers. Germany has a few examples of urban ropeways, such as those built for the Federal Horticultural Shows in Koblenz and Berlin. I hope there will be many more such projects in the conurbations of regions like North Rhine-Westphalia. The advantages of urban ropeways are obvious; in certain situations they make more sense than subways. But further awareness building is definitely required.

ISR: Economically speaking, how well positioned are Germany's ropeway companies for the future?

Matthias Stauch: Germany's ropeway operators coped well during the crisis years by reacting quickly to the challenges and adapting accordingly. The aid provided by the government, especially the short-time work scheme, was also clearly helpful. Climate change is certainly hurting the industry, but our summer product is one of our strengths, and there will be a growing focus on the year-round offering. The important thing is to analyze the situation correctly.



HELMUT SATORI

President of ANEF
South Tyrol (South
Tyrolean Ropeway
Operators
Association)

ISR: Herr Satori, all players are called upon to implement climate mitigation measures. How active are the South Tyrolean ropeway companies in this respect – and with regard to communicating the measures taken?





Helmut Satori: Our operators are doing a lot and are always

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looking for ways to make further improvements, with a focus on efficient capital spending in the right places. With regard to the production of green electricity, for example, some of our members in South Tyrol also operate hydro-power plants. We are constantly working on these challenging tasks and will be focusing even more on these issues in the future. In terms of communication, too, there is still a lot to be done.

ISR: How satisfied are the operators with the winter season so far? And what role does the summer in the mountains play for South Tyrolean ropeways?

Helmut Sartori: We had a very good start to the winter season. The pre-Christmas period was particularly busy, also compared with previous years. Sales of season passes were satisfactory, so overall we were well on track.

With regard to summer on the mountain: We have 358 lifts in South Tyrol (note: as at the end of 2022 according to the Provincial Institute for Statistics), just over a hundred of which are also in operation in summer. What we have seen in recent years is a bigger increase in sales in the summer months than in winter. I am convinced that there will be something of a market shakeout in winter, whereas the summer months will deliver more growth.

ISR: What challenges will South Tyrolean ropeway companies be facing in the foreseeable future?

Helmut Sartori: In the next few years general operating conditions will continue to change. Higher inflation rates in recent years have led to cost increases. As I said, I am expecting a market shakeout in winter. For ski areas of a certain size, it is becoming more difficult to implement capital spending programs as quickly as they would wish. On the other hand, we must not forget that many destinations, in some cases entire valleys, are dependent on tourism, especially winter tourism. So solutions have to be found.

ISR: What developments are giving you optimism for the future?

Helmut Sartori: It's great to see that interest in snow experiences has remained high this winter season and that skiing is still very popular. This makes me feel very optimistic. Visitors to South Tyrol have also become more international, although Germany and Italy remain our core markets.



FRANZ HÖRL
Chairman of the Ropeway Operators Group at the Austrian Chamber of Trade and Industry (WKÖ)

ISR: Herr Hörl, among other things, the ropeway engineering apprenticeship scheme and the Ropeway Academy are ambitious initiatives for recruiting qualified personnel. How successful are these measures?

Franz Hörl: In our opinion, the challenges relating to the employment situation are primarily attributable to demographic trends and the resulting shortage of skilled personnel. Recruitment has become more challenging for ropeway companies in recent years. In the current season, however, we have seen a slight improvement compared with the last two years. Our efforts are already having an effect. The latest industry-wide employee satisfaction survey indicates positive developments in almost all areas.

ISR: Ropeway operators have long been investing in environmental protection measures. How can this commitment be better communicated to the general public?

Franz Hörl: Austrian ropeways have been targeting climate neutrality for several years now – and not through offsetting or greenwashing, but through meaningful capital investment in the infrastructure. This far-sighted entrepreneurial approach is reflected, for example, in our communication project *Sustainable Skiing Every Day*, with which we have made 100 sustainability projects from our regions visible and accessible for all interested parties since the start of the season in the form of clear and transparent messages on our online communication channels – no greenwashing, no marketing gimmicks but measures with a real and verifiable impact.

ISR: Ropeways are a major economic factor. Where can policymakers make improvements to the operating framework so that companies can remain fit for the future?

Franz Hörl: When it comes to sustainability, Austria's ropeways are up with the leaders – also in comparison with other industries. Ropeways are 100% electromobility; snowmaking systems run on local green electricity, and the energy needed for buildings and eateries usually comes from a PV array on the roof.

In terms of the proportion of energy consumption based on renewables, ropeways are among the top 3 in Austria! The industry is committed to sustainability and is looking to make transparent progress on its path towards climate neutrality. But the industry's achievements in terms of sustainability must also receive due recognition. In this context more fairness and greater objectivity are needed in the public debate. There are two other areas in which we are working for improvements on the part of policymakers: faster processing for permits and more support for attracting young people to a career with ropeways. This also involves improving the situation with regard to ski courses provided by schools.

ISR: What makes you optimistic with regard to the future?

Franz Hörl: Austria's annual total of over 50 million skier days shows the undiminished popularity of winter sports in the mountains. Around 70% of our guests come to ski and almost 90% are highly satisfied with our skiing-based product.

Thomas Schweighofer

The interviews were conducted in March 2024. ISR would like to thank the interviewees.



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Fast track in North America

DOPPELMAYR GROUP Thanks to profitable ski resorts and numerous system upgrades, North America has become the Doppelmayr Group's biggest market for the first time ever. For the 2023/24 winter season, the market leader completed over 30 new installations in the USA and Canada.



Wild Blue Gondola Section II was added to the Steamboat Ski Resort offering in the 2023/24 winter season.



The *Wild Blue Gondola* is impressive in many ways, e.g. for the world's largest Doppelmayr *Direct Drive* motor and a line length of over 5 km.

Since financial 2022/23, North America has been Doppelmayr Group's biggest market with a 28% share of total sales, overtaking Austria, which had previously always been the Group's largest single market and most recently accounted for 12% of sales. In a highly competitive business environment, the Doppelmayr Group now has a market share of almost 60% in North America.

STILL GOING UP

Thirty Doppelmayr ropeways were completed for the 2022/23 winter season followed by 33 for 2023/24. "We support our customers, for example, with the modernization of existing installations. However, new builds that replace outmoded ropeways form the bulk of our contracts," says Katharina Schmitz, President of Doppelmayr USA. According to the Doppelmayr Group, the impressive volume of orders is also the result of close cooperation between all subsidiaries. Doppelmayr has also set up a project team in the USA that is fully focussed on every individual project. In order to cope with the growing volume of orders and increased sales, Doppelmayr USA has hired 100 additional employees in the last few years. The organization also stresses the importance of frictionless coordination and cooperation between all subsidiaries for the ability to satisfy customers' individual wishes and needs. "The opportunity to share know-how and resources within our organization structure is a huge bonus for our customers. It's not just about providing the expertise but also about high-quality workmanship", says Thomas Pichler, Member of the Management Board at the Doppelmayr Group.

One of the big hits in the Doppelmayr portfolio is the *D-Line*. Since the *Ramcharger 8* was installed at Big Sky Resort in Montana in 2018 – as the first 8-seater chairlift in North America – numerous other *D-Line* ropeways have been commissioned – eleven in the 2023/24 winter season alone.

In Canada, too, there is keen interest in this ropeway generation, with the first two *D-Line* installations completed there by the end of 2023 (the *Adventure 8* at Mount St. Louis Moonstone and the *Fitzsimmons Express* at Whistler Blackcomb).

BIG IS BEAUTIFUL

One of the Doppelmayr Group's latest major projects in the USA is the upgrade to final capacity of the *Wild Blue Gondola* at Steamboat Resort in Colorado. The first section was opened in 2022, and the second section was added a year later. With its impressive specifications, the *D-Line* 10-seater gondola lift has inspired the affectionate nickname "The Monster". *Wild Blue Gondola Section II* has a *Direct Drive* motor with a diameter of 4.5 meters – currently the largest gondola motor in the world, according to Doppelmayr. Further impressive details: The tallest tower is 29 meters high, the haul rope has a diameter of 64 mm, and line speed is 7 m/s. The ropeway operates with 113 *Omega V* cabins from CWA. Transit time from the bottom station to Sunshine Peak is around 13 minutes for a line length of over 5 kilometers, which according to the Doppelmayr Group makes it the longest 10-passenger gondola lift in the whole of North America. If necessary, operations can be limited to just one of the two sections – a flexible solution should there be too much wind higher up the mountain.

Superb ropeway engineering and views are also the hallmark of the new *Lone Peak Tram* at Big Sky in Montana in the Rocky Mountains. Garaventa, the specialist for funiculars, reversible aerial tramways and special ropeways, built this impressive aerial tramway as a replacement for an installation that had been in operation for 27 years. The new Big Sky reversible was officially opened in mid-December 2023 as a key item in the ten-year Big Sky 2025 plan, which is aimed at reimagining and upgrading the visitor experience in the region. One of the highlights of the new installation is the cabins built by



The Lone Peak Tram at Big Sky, Montana, is as impressive as the views it provides.



A winery with a ropeway: The new Sterling Vineyards Gondola in Napa Valley was not only built by Doppelmayr; the company is also responsible for operation and maintenance.

CWA, another Doppelmayr company. Each cabin can take up to 75 passengers, including seating for twelve, and features two rectangular glass floor panels that offer spectacular views of the landscape in summer (and are covered for winter operation). The Lone Peak Tram climbs 650 vertical meters to the top station at an elevation of 3,400 meters, which makes it the highest scenic viewpoint in Montana.

A ropeway experience of a special kind is provided by the 8-seater gondola lift at Sterling Vineyards, one of the leading wineries in California. Following a major fire in Napa Valley in 2020, Treasury Wine Estates commissioned the Doppelmayr Group to rebuild the historic Sterling Vineyards Gondola. The customer again opted for D-Line technology and comfortable Omega V cabins. Since October 28, 2023 the new gondola lift, which now runs on 100% green energy generated by Sterling Vineyards' own solar power plant, has been taking wine lovers soaring along a triangular oneway line to the tasting site with fine views of the Palisades Mountains. In addition to the contract for the construction of the new ropeway, Doppelmayr also landed a five-year contract for operation and maintenance (O&M), including station monitoring and guest service.

AUTONOMOUS FUTURE OF ROPEWAY MOBILITY

The Doppelmayr Group has received a contract for the design, construction, operation and maintenance of an automated Cable Liner at Newark Liberty International Airport. The contract includes US\$ 570 million for the design, engineering and construction of the Cable Liner plus US\$ 385 million (net present value) for operation and maintenance of

the installation over a 20-year period. The opening of the new AirTrain Newark is scheduled for 2029. The Doppelmayr Group has successfully handled a number of similar projects in the USA, including the Oakland Airport Connector and two Cable Liner systems in Las Vegas.

The importance of autonomous systems for the mobility of tomorrow is reflected in the Doppelmayr Group's efforts and successes in other areas of rope-hauled transportation. *Autonomous Ropeway Operation*, or AURO for short, is Doppelmayr's name for the technology of autonomous ropeway mobility first implemented in gondola lifts and now, since the 2023/24 winter season, also available for chairlifts. The ropeway authorities in Switzerland and Austria have already granted the relevant operating licenses, and the first AURO chairlifts are now operational at Wildhaus near St. Gallen (CH) and Silvretta-Montafon in Vorarlberg (A), with four more installations scheduled to follow in those two countries this year. In the case of autonomous chairlift operation, the unloading area in the top station is monitored with the help of AI-assisted image processing. The system identifies hazardous situations and decides autonomously, depending on the situation, whether the installation can continue to operate or should be slowed or shut down. AURO offers advantages in terms of enhanced safety and reduced personnel requirements, with troubleshooting for the installation (or even several installations) performed by just one person from the Ropeway Operation Center housed in the bottom station. Even taking license costs into account, the result is still savings in personnel costs.

In North America, too, there is great demand for additional safety monitoring systems for ropeways. The Doppelmayr Group has now paved the way for the use of this technology in the USA by acquiring a patent for video monitoring from PyxisAi. However, official approval for autonomous operation has not yet been granted in the USA, and the function is therefore restricted for the time being to that of an assistance system that immediately notifies the ropeway operator when an anomaly is detected. It is then up to the operator to decide what action to take in the individual case. The Doppelmayr Group is working hard to get full AURO operation approved in the USA. The assistance function is currently being tested on two pilot installations in Canada.

Thomas Schweighofer



With the acquisition of a patent for video monitoring, the Doppelmayr Group is laying the foundations for autonomous ropeway mobility (AURO) in North America, too.

First Smart Service Summit

FATZER The Fatzer Smart Service Summit held in Orlando in March was a significant milestone in terms of technology, innovation and the latest trends.



The participants at the first Fatzer Smart Service Summit in Orlando were delighted with both the information provided and the opportunities for contacts with colleagues.

Regular rope inspection and maintenance are essential tasks for every ropeway operator. With *Smart Service*, Fatzer has developed a business unit that provides a holistic combination of expertise, real-time monitoring, and customer support. *Fatzer's Smart Service* offering comprises a coordinated set of individual and modular services for the safe, reliable, and economical operation of rope-hauled systems and structural ropes in the long term – on an ad hoc, project, or permanent basis. The individual modules are precisely coordinated and seamlessly interlinked in practice.

With *Smart Service*, customers receive a customized service package that can be adapted to changing needs. Fatzer's aim is to be a reliable partner for its customers, one that "speaks their language, understands their needs" and always has an eye on future innovations. The company wants to be seen as a genuine performance partner that supports customers with industry-specific expertise and customized services. A package combined with intelligent sensor technology, underpinned by *TRUscan*, *TRUcockpit*, and *TRUpin*, is the key to predictive services and cost security over the entire life cycle of the customer's ropes. The result, according to an expert in roped systems and structural ropes, is maximum availability, minimum downtime, and optimized resource utilization.

EVENT IN ORLANDO | DISNEY WORLD

Fatzer's innovative *Smart Service*, which has been presented at major trade shows such as InterAlpin 2023 in Innsbruck (A)

and Mountain Planet 2024 in Grenoble (F), was recently the focus of the inaugural Fatzer Smart Service Summit, held in Orlando from March 13 to 15. Among the high-profile speakers and attendees were representatives from the Doppelmayr Group, Walt Disney World, TechnoAlpin, claystreetX, Peak Tramways Company, Düsseldorf University of Applied Science, Swyft Cities, TRUcompany, Rotec, Telluride Ski & Golf, and Portland Aerial Tram.

The two-day event, held at the Wyndham Lake Buena Vista Hotel at the Walt Disney World Resort, featured presentations and discussions on topics ranging from the latest technological developments to proven strategies for improving operational efficiency. Attendees were offered a global perspective on smart services, including the latest trends, the evolving landscape, and innovations in system and rope technology and rope monitoring. "I was pleased to find that the Fatzer Smart Service Summit reflected the commitment of a company that is truly helping the industry build relationships and connections," said Mike Deiparine of Consulter SCJ Alliance.

The Smart Service Summit provided the 35 attendees with interesting operational insights. The *Disney Skyliner* at the Walt Disney World Resort in Bay Lake, Florida is one of the first ropeways in the world to use *Fatzer Smart Service* with the new *TRUscan* rope testing device. A technical tour gave attendees a behind-the-scenes look at the 10-passenger gondola lift, which was built by Doppelmayr USA in 2019. "This event was a unique experience in terms of knowledge sharing, networking, learning, and collaboration," concluded Philipp Enzler, Fatzer Sales Manager (USA, Canada, UK, Ireland), adding, "We are grateful for this opportunity to exchange ideas with industry leaders and strengthen the future of *Smart Services*."



Frank Amend, Business Development manager Fatzer, Structural Ropes USA, during his presentation. The Fatzer Smart Service offerings range from one-off consulting and predictive maintenance to complete and comprehensive system monitoring.



Philipp Enzler, Sales Manager at Fatzer, and his team put together a great program.



The renowned speakers at the event included Samuel Lee, General Manager Peak Tram Hongkong.

IMPORTANT AMERICAN MARKET

"We wanted to make our mark on the North American market in particular," says Enzler, explaining the decision to hold the event in the United States. "The *Disney Skyliner* is a best-practice example that shows how well *Smart Service* can be integrated into a customer's operations. The visit also permitted the participants to experience and understand the ideas around urban ropeways".

Fatzer Smart Service is a modular, coordinated service package. Several ropeway operators, particularly in South and Latin America, are taking advantage of these services, including urban ropeways in La Paz (Bolivia), Medellín (Colombia), and Mexico City, all of which now have *TRUscan* in operation. "These ropeways already have continuous monitoring on a daily basis – including splice renewal and monitoring capabilities in some cases – but not yet as a complete end-to-end package," says Enzler. The medium-term goal is to implement 360-degree support, starting with consulting, training, technical services, and digital monitoring with a digital twin from installation all the way to rope discard.

The Fatzer sales manager admits that some customers still need to be educated about the concept. "We see that some customers tend to focus on individual components and fail to consider the entire system and network, especially over a longer period of time. The complete package of *Performa* ropes and *TRUscan*, for example, offers huge advantages in the life cycle of the ropes. Although the initial cost is about twice that of *Compacta* ropes, you can expect twice the service life and about 40 percent less wear on the sheaves," says Enzler. Fatzer is currently working on simulating these correlations in a life cycle model in order to be able to demonstrate the advantages more clearly for the operational situation of the complete installation.

NEXT FATZER SMART SERVICE SUMMIT

Due to the very positive feedback "and because we want to reinforce the message," Philipp Enzler says that the next Fatzer Smart Service Summit will take place in 2025, again in the U.S., with the exact dates and location to be announced.

Thomas Schweighofer

PHOTOS: FATZER

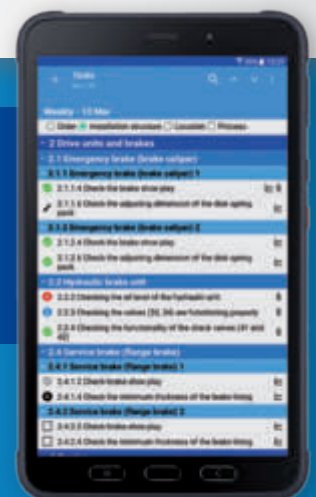


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Sambesi makes light work of the duty of care

REMEC The *Sambesi* documentation and maintenance software from the Swiss company Remec is in use on well over 2,000 ropeways worldwide – including the Icy Strait Point installations at the popular cruise port in Alaska (USA).



Icy Strait Point in Alaska started using *Sambesi* for safety management and maintenance planning four years ago.

The professional *Sambesi* maintenance software offers operators convenient handling of today's mass of maintenance work data.

For ropeway operators, documentation in the context of the duty of care can be a challenge because all maintenance work carried out must be precisely recorded and easily retrievable. *Sambesi* is a cloud-based 360-degree management tool that provides operators with a professional and user-friendly solution to the problem. The proven high level of functionality of the software – over 300 customers in seven countries now rely on *Sambesi* – also convinced the operating company of Icy Strait Point. Remec's documentation and maintenance software was installed in spring 2020 and is now in use on all five of the resort's installations, including the two 8-seater Doppelmayr gondolas, *Sky Glider* and *Transporter*, which carry visitors up Hoonah Mountain. "*Sambesi* is an integral part of our daily inspection routine. *Sambesi* allows us to easily schedule, execute, log, review and track all of our daily's, weekly's, monthly's, yearly's, etc. for our two Doppelmayr gondolas, the world's largest ZipRider, Adventure Park, 2 MW CAT power plant, and vehicles," says Joe Puliafico, Director of Mountain Operations at Icy Strait Point, and he adds: "It also stores all of the manufacturers' manuals and documentation for easy reference in the field. We also use it to maintain our inventory of spare parts for all the aforementioned attractions, vehicles and facilities."

THE MANY ADVANTAGES OF SAMBESI

The software captures and reliably analyzes all operational processes for ropeways (and for many other installations, from sports stadiums to swimming pools). Slope status, snowmaking systems, vehicles, tools and much more can be managed with *Sambesi*. With its modular structure, the software can be customized to meet individual requirements and is therefore suitable for companies of all sizes.

Tablets are used for on-site entry of all maintenance work data and any incidents. All relevant system data are available for viewing at a glance.

Speed of implementation is another advantage of the Remec solution. "You can be managing your first installation with *Sambesi* in about two months," Johannes Stadler, Managing Director of Remec AG, explains. The implementation period may be slightly shorter or longer depending on the complexity of the project, the scope of the infrastructure and the modules used. The Remec team of qualified ropeway specialists is well trained and experienced. "We can talk to our customers about their requirements as equals and quickly assemble the right package," says Johannes Stadler.

NETWORKED SOLUTIONS

A major benefit of the software is the fact that it is manufacturer-independent and open for third-party applications. "With the appropriate interfaces, we are able to import the data directly into our system," says Stadler. Integration with Fatzer's *TRUcockpit* was recently implemented, while the interface to *SisControl* (a Sisag product) has been in place for some time.

In addition to *Sambesi*, the Remec portfolio also includes *Kassandra*, a forecasting and analysis software that predicts the upcoming number of visitors, and the *Pollux* destination simulator, which precisely analyzes visitor flows in the region to enable data-based strategic decision-making. Users can benefit from the strengths of *Sambesi*, *Kassandra* and *Pollux* as stand-alone or networked solutions. With its complete digital package, Remec AG supports customers in their strategic decision-making, destination upgrades and documentation of company-wide day-to-day operations.

Thomas Schweighofer



The customized design of *Neveplast Lift* gives the ski area an exclusive touch and unique identity.

Lift in a customized version

NEVEPLAST Changing environmental conditions present significant obstacles for winter sports enthusiasts worldwide. In this context, *Neveplast Lift* has emerged as an useful solution that is increasingly appreciated by ski resort managers.

With the help of *Neveplast Lift*, ski resorts have managed to overcome difficulties related to inadequate snow cover in the chairlift boarding and disembarking areas and ensure a seamless and satisfying experience for skiers. For the visionary Colere Infinite Mountain project, a ski resort in the Bergamo area (IT) currently undergoing significant development, Neveplast has created a fully customized version of its product.

Neveplast Lift offers an effective solution that enhances the overall experience for skiers and ski area operators. With its cutting-edge approach and eco-sustainability, it represents a significant advancement in the industry, demonstrating that technological innovation can be reconciled with environmental conservation. Once installed at the beginning of the season, *Neveplast Lift* – with its functionality and convenience – ensures an ideal user experience in any area, regardless of snow cover. This eliminates the costs associated with snow production and handling in locations that are hard of access.

Silvio Rossi, Sole Director of Colere Infinite Mountain, is satisfied with the job done by Neveplast: “We installed *Neveplast Lift* at the loading and unloading points of two new lifts to ensure that the boarding and disembarking areas, which can sometimes be critical, are always operational and lift personnel have one thing less to worry about. The Neveplast team did an excellent job of meeting our requirements within tight deadlines.” Colere Infinite Moun-

tain wanted something unique, something that reflected their image and style – hence the idea of customizing the lift by prominently featuring the company logo. Collaboration with Neveplast is now set to continue with other projects to make the ski resort more competitive not only in winter but also in the summer months. This represents the start of Colere Infinite Mountain's journey towards a complete refurbishment.

HIGHLY FUNCTIONAL AND USER-FRIENDLY

Like all other key products in the Neveplast range, *Neveplast Lift* underwent a significant redesign in 2023. The new version incorporates several innovations, starting with the new geometry that absorbs thermal expansion due to rising temperatures, ensuring a flat surface in all weather conditions. The module dimensions are smaller than on the old model, while the convenient interlocking system ensures the ease of installation that comes with all Neveplast products. Niccolò Bertocchi, CEO at Neveplast, stresses the company's combination of an international market presence and strong local roots in the Bergamo area. “We are proud of the fact that most of our turnover comes from international sales because that means our products are a global success. However, the bond with our home territory remains fundamental and is also a point of pride for the company,” says Bertocchi.

TS



The *EDS* electric drive is quickly connected to the *SS40 AWD* cable carriage.

Cable carriage for long and steep rope fields

IMMOOS The *SS40 AWD* developed by Swiss ropeway passenger evacuation specialist Immoos is a cable carriage which, in combination with the *EDS* electric drive, is particularly suitable for use on long and steep rope fields. The system is ideal for passenger evacuation in difficult terrain in particular.

TECHNICAL DATA

Cable carriage *SS40 AWD*

Max. rope inclination (downhill):	105% (~ 45°)
Max. speed:	approx. 1.8 m/s
Service load (v ≠ 0):	125 kg (1.25 kN)
Service load (v = 0):	250 kg (2.5 kN)
Certification:	Ropeway Regulation (EU) 2016/424 and EN standard 1909

Electric drive *EDS*

Max. rope inclination (uphill):	60% (~ 31°)
Speed:	0 – 1.8 m/s, stepless adjustment
Battery capacity:	33.8 Ah
Forward and reverse travel	

In challenging evacuation scenarios, it is essential to have the right gear. "A key feature of the *SS40 AWD* cable carriage is the very low level of wear when used on long and steep rope fields," says Florian Immoos, CEO of Immoos GmbH, which is headquartered in Switzerland.

STEEP ROPE FIELDS, SMALL ROPE DIAMETERS

In combination with the *EDS* electric drive, the *SS40 AWD* cable carriage offers reliable uphill travel at rope inclinations of up to 31° with a maximum user weight of 125 kg. It is particularly suitable for use in long and steep rope fields and also for travel on small-diameter ropes.

POWERFUL ELECTRIC DRIVE

The *EDS* electric drive system was developed by Immoos itself. In addition to the powerful drive for uphill travel, the system works with brake energy recuperation to recharge the battery on downhill travel. This ensures that rescuers

have the power and capacity needed for a reliable evacuation operation. The Immoos *EDS* is designed to handle rope inclinations of up to 60%.

EVACUATION PLAN FOR A SWISS AERIAL TRAMWAY

A good example of how the combination of *SS40 AWD* and *EDS* can be incorporated into an evacuation plan is provided by the aerial tramway connecting Chalais and Vercorin in Canton Valais, Switzerland. The reversible crosses several power lines, and Immoos has drawn up an evacuation plan for the case where one of the 15-passenger cabins comes to a stop directly above a power line and the passengers have to be evacuated.

CONTROLLED SPEED OF DOWNHILL TRAVEL

According to the evacuation plan, as soon as the alarm is raised, a rescuer uses an Immoos *SS1* cable carriage to reach the immobilized cabin from the nearest line tower in order to assist the passengers in the cabin. At the same time, a second rescuer approaches the cabin using the combination of *SS40 AWD* cable carriage and *EDS* electric drive to travel uphill from the bottom station. The *SS40 AWD* has running gear designed for safe passenger transportation and a track-rope brake to control the speed of downhill travel.

ABSEILING WHEN CLEAR OF THE DANGER ZONE

In the cabin, the passengers are fitted with an Immoos evacuation harness and clipped onto the abseiling device, which is attached to the cable carriage. With each passenger, the rescuer travels along the rope to get out of the danger zone and reach a point where safe vertical abseiling is possible. Once the passenger is on the ground, the rescuer returns along the rope to the cabin, and the process is repeated until all 15 passengers have been evacuated.

Dieter Krestel



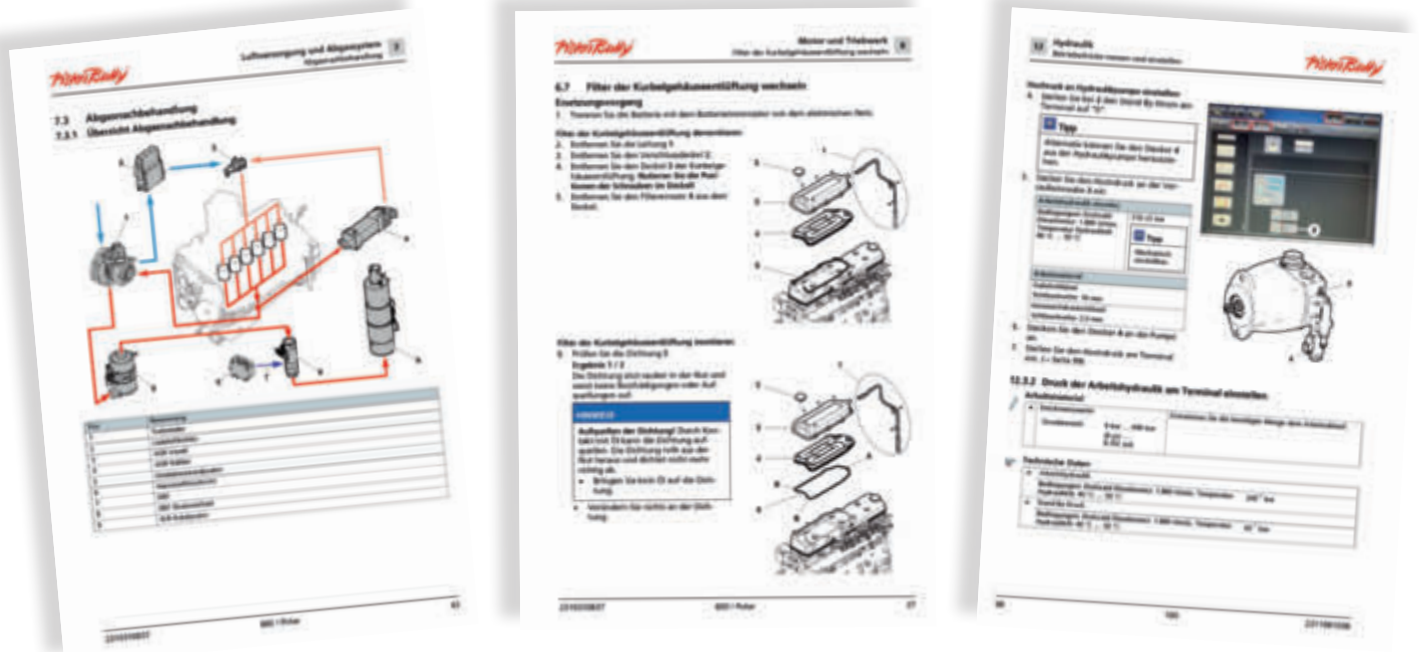
The *EDS* electric drive system developed by Immoos can handle gradients of up to 60% and features brake energy recuperation for recharging the battery during downhill travel.



Evacuation training provided by Immoos in Vercorin, Valais, using a combination of *SS40 AWD* cable carriage, *EDS* electric drive and the Immoos *CS 141* evacuation harness

Workshop manuals for the Pistenbully

KÄSSBOHRER The useful workshop manuals now available for certain Pistenbully models provide detailed support with technical details on all tasks related to Pistenbully and additional information on maintenance, repair and service topics.



The technical information in the workshop manual on solving problems, carrying out repairs and ultimately ensuring smooth operation is both detailed and easy to understand

Pistenbully workshop manuals provide extensive information, such as details on the engine, gear box, electronics, chassis and other components, and ensure that service and maintenance tasks are performed reliably and efficiently. In addition, they cover all the versions of the respective model (e.g. with/without winch). They are currently available for Pistenbully 100 and 600, with additional model variants due to follow. The technical information provided in the workshop manuals helps users to solve problems and carry out repairs and so ensures smooth groomer operation. The manuals can be accessed online on Kässbohrer's upkeep and maintenance management platform *SNOWsat Maintain*.

A WEALTH OF USEFUL INFORMATION

The workshop manual contains detailed descriptions of how to carry out the maintenance measures from the

maintenance schedule. Detailed instructions for repairs and replacement tasks enable workshop staff to carry out repairs properly and to ensure that all components are fitted correctly. The manual also contains safety instructions that enable workshop employees to work safely and responsibly. This is particularly important in avoiding accidents and injuries.

INSTRUCTIONS FOR DIY

With their detailed technical information, Pistenbully workshop manuals provide optimum support for all tasks related to the snow groomer. They are an ideal reference work for workshop personnel. They help avoid costly errors and extend the groomer's service life. Kässbohrer stress that access to precise information means repairs and maintenance tasks can be performed faster and more efficiently.

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PISTENBULLY WORKSHOP MANUAL

Pistenbully workshop manuals are included in both the free and paid versions of *SNOWsat Maintain*. *SNOWsat Maintain* is the solution for efficient maintenance management from Kässbohrer Geländefahrzeug AG.

Basic: Workshop manual (abridged version)

Professional: Workshop manual with all contents and detailed descriptions of all tasks



www.snowsat.com/en/solutions/maintain-basic



Top athlete and Pistenbully partner Anna Gasser at the X-Games.



Perfect parks for winning performances

KÄSSBOHRER The exceptional Austrian athlete and Pistenbully partner Anna Gasser was successful at the X-Games.

In January, Kässbohrer announced its collaboration with the internationally renowned freestyle snowboarder and Olympic champion Anna Gasser. She has already won gold medals at the X-Games and gold at the 2018 Olympic Winter Games in Pyeongchang and the 2022 Olympic Winter Games in Beijing. At the latest X-Games, which took place in Aspen, USA, at the end of January 2024, she once again achieved top placings, coming 4th in slopestyle and 3rd in the Pacifico Women's Snowboard Big Air competition.

Park construction for competitions such as the X-Games places special demands on man and machine. The Pistenbully park machines were developed in cooperation with experienced park construction professionals to meet these

challenges. All over the world, leading ski resorts rely on the sophisticated technology and decades of experience of Kässbohrer, especially with regard to snow groomers for park construction.

Kässbohrer has the right machine for all tasks in this challenging field. The red snow groomers from the German manufacturer come with the latest technology. The Pistenbully 400 *ParkPro* is also available with a powerful winch, e.g. for working on the extreme inclines of the kickers, while the Pistenbully 600 *Polar Park* ensures maximum pushing power in park construction. An overview of the various models is available online at www.pistenbully.com/en/snow-groomers.

TS

PHOTO: KÄSSBOHRER

The 25,000th Pistenbully

KÄSSBOHRER An impressive number and confirmation of quality: the 25,000th Pistenbully has rolled off the line. It will do service in the Spanish Sierra Nevada.

Snow groomer no. 25,000 is a Pistenbully 600 E+ with diesel-electric drive. It is now part of the Sierra Nevada fleet – one of 8 green machines in service there. The Sierra Nevada ski resort has been 100% committed to Pistenbully for many years. A critical step in this success story was the 1996 Alpine Ski World Championships held at Sierra Nevada. At this first major event in Spain, Pistenbully was the official supplier and, together with the Spanish dealer Casli S.A., laid the cornerstone for a long and successful partnership with this alpine ski resort, whose foothills extend to the Mediterranean Sea. Such long partnerships do not simply happen. They are dependent on quality products, innovation, professional customer support, reliable service and a relationship based on trust. "Quality products and reliable partners stand for long-term thinking. This is why we go for durable machines, which can be relied on in all situations," says José Luis Romero, Deputy Managing Director at Sierra Nevada.



The workforce at Kässbohrer Geländefahrzeug AG celebrated production of the 25,000th Pistenbully in style.

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PHOTO: KÄSSBOHRER

Revolution on the slopes with the Pipe Monster

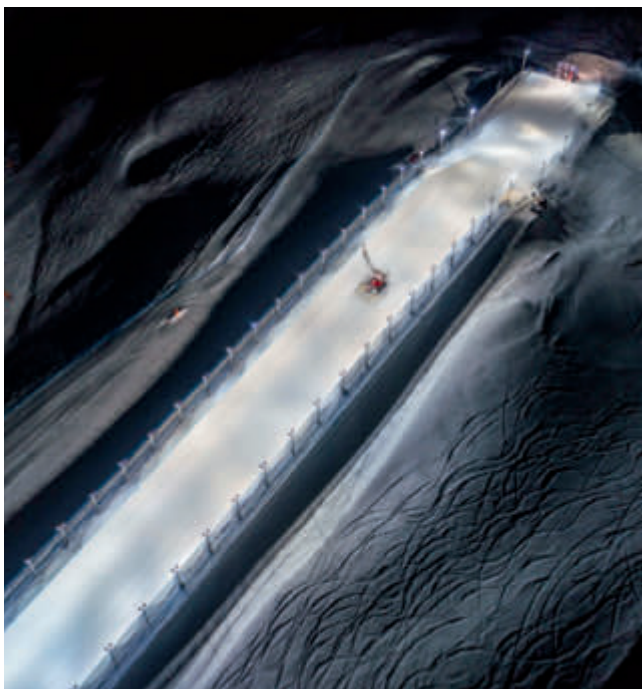
ZAUGG AG EGGIWIL The *Pipe Monster* from Zaugg AG Eggwil sets new standards for the way halfpipes are groomed and redefined and stands for quality and performance.

Since its launch, the *Pipe Monster* has impressed slope operators all over the world. Its unique design and advanced technology enable precise and efficient grooming of halfpipes, quarterpipes and other challenging slope shapes. With its robust construction and powerful functions, the

Pipe Monster is more than just a tool; it is a partner for slope operators. It was developed in collaboration with slope experts, snow sports enthusiasts and the specialists at Zaugg AG Eggwil. Every detail has been thought through and designed to meet the requirements of modern pipe shaping:



The *Pipe Monster*, with its innovative features and impressive performance, is used for halfpipes all over the world – here in Tignes, France.





The *Pipe Monster* combines robust engineering with powerful pipe design features.



The *Pipe Monster* boasts precision steering and versatility in any terrain – here at work in Leysin Park in the Vaud Alps (CH).

From precision steering to versatility in any terrain, Zaugg have designed the *Pipe Monster* for top performance.

THE SECRET OF SUCCESS

As pioneers in their field, Zaugg AG Eggwil have made it their mission to push boundaries and set standards. The company is more than just a manufacturer of snow clearing equipment from Switzerland; they are specialists in their field with a reputation for quality and reliability.

They have been manufacturing snow clearing equipment since the 1960s, and their machines are indispensable tools for winter maintenance for many ski resorts all over the

world. This is a result of robust design and first-class workmanship in combination with the pursuit of continuous innovation. Zaugg AG Eggwil has a focus on investment in research and development, from ground-breaking snow-plow designs to high-tech control systems for maximum precision and efficiency.

Last but not least, the company has a strong corporate culture based on tradition, teamwork and the needs of the customer. The resulting commitment of their employees is a factor in the success of a company that makes roads and railroads safer and more accessible.

TS

PHOTOS: ZAUGG AG EGGIWIL

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What began on a small scale in 1974 has developed over the past five decades into the leading venue for the ropeway industry.

The 25th edition of the trade show will take place from May 6-9, 2025. Messe Innsbruck will again be the hotspot for the international ropeway and alpine technology industry.

Interalpin celebrates

ANNIVERSARIES The leading international trade show for alpine technologies in Innsbruck, Austria is celebrating its 50th anniversary in 2024, and the 25th edition of InterAlpin, which is organized every two years, will take place in 2025.

In the right place at the right time: that's how InterAlpin came to be. With the expansion of alpine technologies and the increasing number of tourists visiting Tyrol in winter, the trade fair in the alpine city of Innsbruck became one of the world's most popular industry venues and developed a global appeal.

SUCCESS STORY

In 1974, a ropeway industry product presentation took place in the framework of the International Ski Congress at the Kurhaus in Igls, which is now run by Congress Messe Innsbruck (CMI) as the Igls Congress Park. One year later, the presentation was held at the Innsbruck Congress Centre and renamed InterAlpin. In 1977 it was held as an independent exhibition for the first time – under the tagline *Trade Exhibition for Winter Service Equipment* – with 72 exhibitors and visitors from over 20 countries. In 1978, the number of exhibitors increased to 84 and in 1980 to 120.

"From this point onwards, the InterAlpin success story was unstoppable. With Congress Innsbruck bursting at the seams at the beginning of the new millennium, InterAlpin moved to Messe Innsbruck in 2002, where it is still held and continues to grow today", says Stefan Kleinlercher, project manager for

the trade show. In 2023, InterAlpin attracted over 35,000 trade visitors from approx. 130 nations and around 650 exhibitors from over 50 countries.

PREPARATIONS FOR THE 2025 ANNIVERSARY EDITION NOW IN FULL SWING

From May 6-9, 2025, InterAlpin will once again be showcasing the latest innovations and topics in the industry. In addition to the opening ceremony, the first day will be devoted to the Austrian Ropeway Conference presented by the Austrian Ropeway Association and will conclude with the festive *InterAlpin Snow Crystal Gala*. The *InterAlpin Inspiration Days* on days 2 and 3 will highlight and offer a platform for discussion for current issues in the industry with high-calibre keynote speakers and expert presentations. The General Assembly and seminar of the International Organization for Transportation by Rope (OITAF) is also a regular – and very popular – item.

An InterAlpin delegation attending the 2024 OITAF International Ropeway Congress to be held from June 17- 21 in Vancouver.

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