

REPORT

# 2019

COMPANIES OF HIGH TECHNOLOGY INDUSTRIES



# Future-oriented

The development of modern technologies and continuous work to produce innovations and high-quality product design is part of our Group's tried-and-tested strategy. This is how we convince our customers around the world and strengthen our success.



# Combined strength: High Technology Industries



Cable-hauled passenger transport systems for use in mountains and cities

Page 8 – 9



Cable-hauled passenger transport systems for use in mountains and cities

Page 22 – 23



Material transport systems

Page 36 – 37



Snow groomers and tracked utility vehicles for all kinds of slopes and terrain

Page 40 – 41



Complete solutions for fully automatic technical snowmaking

Page 50 – 51



Megawatt-class gearless wind power plants

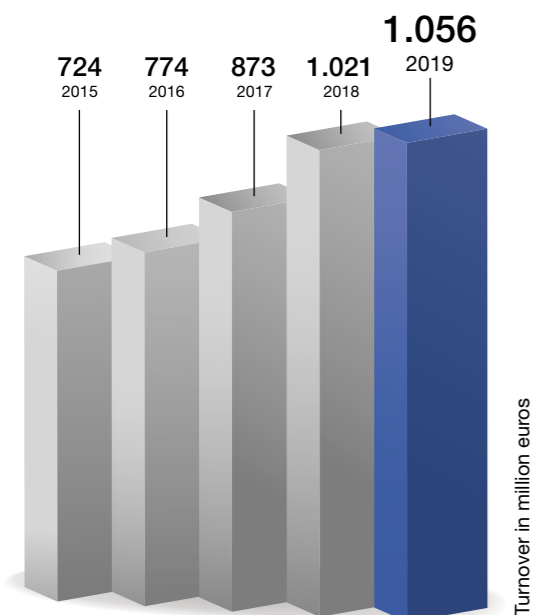
Page 56 – 57

# Trusted innovative

## Turnover

We were able to increase consolidated sales to 1.05 billion euros in 2019.

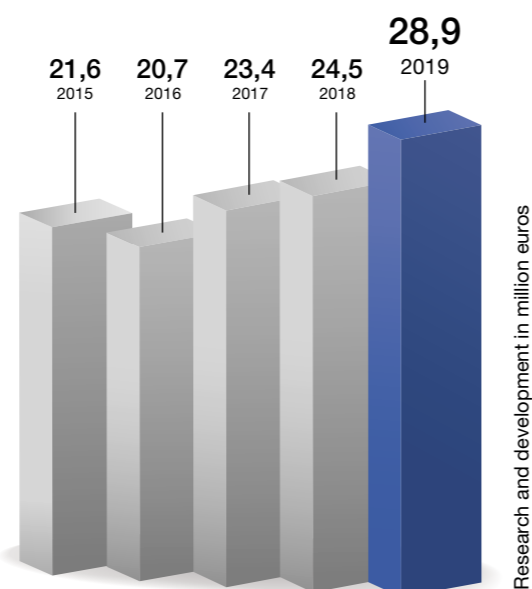
- 78 ropeway systems
- 4 wind power plants
- 945 snow groomers and tracked utility vehicles
- 2,000 snowmakers



## Research

Technological innovations are part and parcel of our HTI Group. This is why we invest heavily in R&D – the total figure for 2019 was 28.9 million euros.

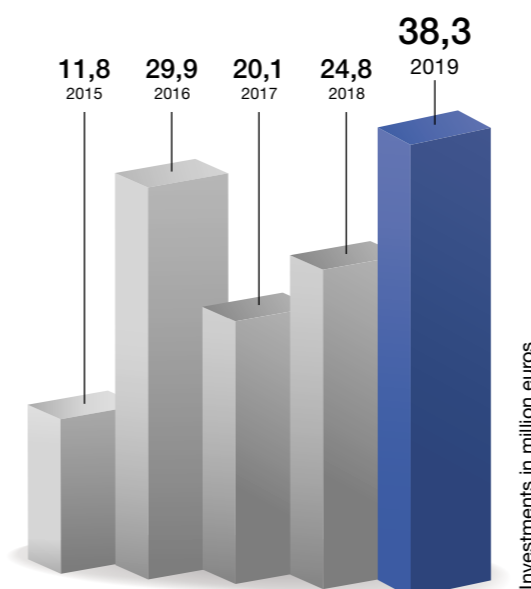
- Ropeway systems: further development of the stations for detachable systems with a particular focus on bicable gondola stations and various components along the ropeway line
- Snow groomers and tracked utility vehicles: development work on Stage V generations of vehicles
- Snow gun: completion of the new Titan 4.0 fan gun and further development of the Snowvisual and DEMACLENKO Control software
- Wind turbines: completion of the new Typhoon class LTW80 and further development of the LTW42.



## Investments

HTI Group invested 38.3 million euros in 2019, expanding their capacities and network and thus helping to further extend our global market position.

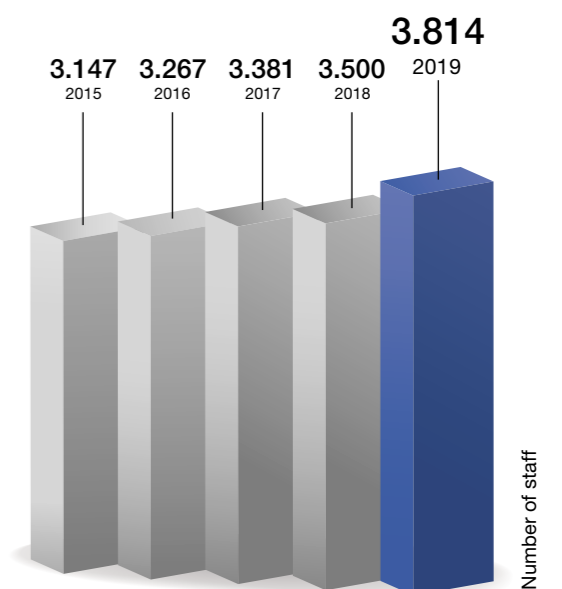
- Expansion of premises at the headquarters in Voreppe/France and purchase of machines for the plant in Gilly-sur-Isère in Savoy/France
- Purchase of new CNC processing centers and a robotic welding system for welding large components for the plant in Campi di Sotto in Vipiteno/Italy.
- Construction of the new DEMACLENKO company offices and improvements to the access roads in Campi di Sotto in Vipiteno/Italy.
- New LEITWIND Service branch in Lacedonia/Italy



## Employees

Our Group employed 3,814 staff worldwide in 2019.

- Around 2.3 million euros in training and further development
- 41,692 hours of further training
- 235 internships
- 49 apprentices



# Customizable High-Tech

2019 was another intensive and very successful year for LEITNER ropeways. The company was able to further strengthen its position in core markets and succeeded in considerably influencing the future of ropeways with innovative thinking and action. A decisive factor here is the company's continually expanding expertise in terms of combining the tried-and-tested technologies in the best possible ways and thus being prepared for any situation. Above all, the basic values that have been one of the company's key priorities from the very outset have contributed to this form of reliability: quality and innovation can be implemented to the highest degree independently for every customer request through the provision of many individual configuration options. Producing customized products is therefore among LEITNER ropeways' greatest strengths. True to the motto "Customization is part of our standards", the company also managed to implement 42 exciting and sometimes groundbreaking projects in 14 countries in 2019. The huge variety in the LEITNER ropeways fields of activity was once again evident, whether from a geographical, technological, or topographical perspective. The success of ropeways as an efficient, environmentally friendly, and safe means of transport is not just recognized in the mountains, but in cities too. This is also demonstrated by the range of projects in many regions around the world. For LEITNER ropeways, the positive developments once again pay testament to following the chosen course and continuing to promote and expand on hard-won strengths.

NORWAY – VOSS

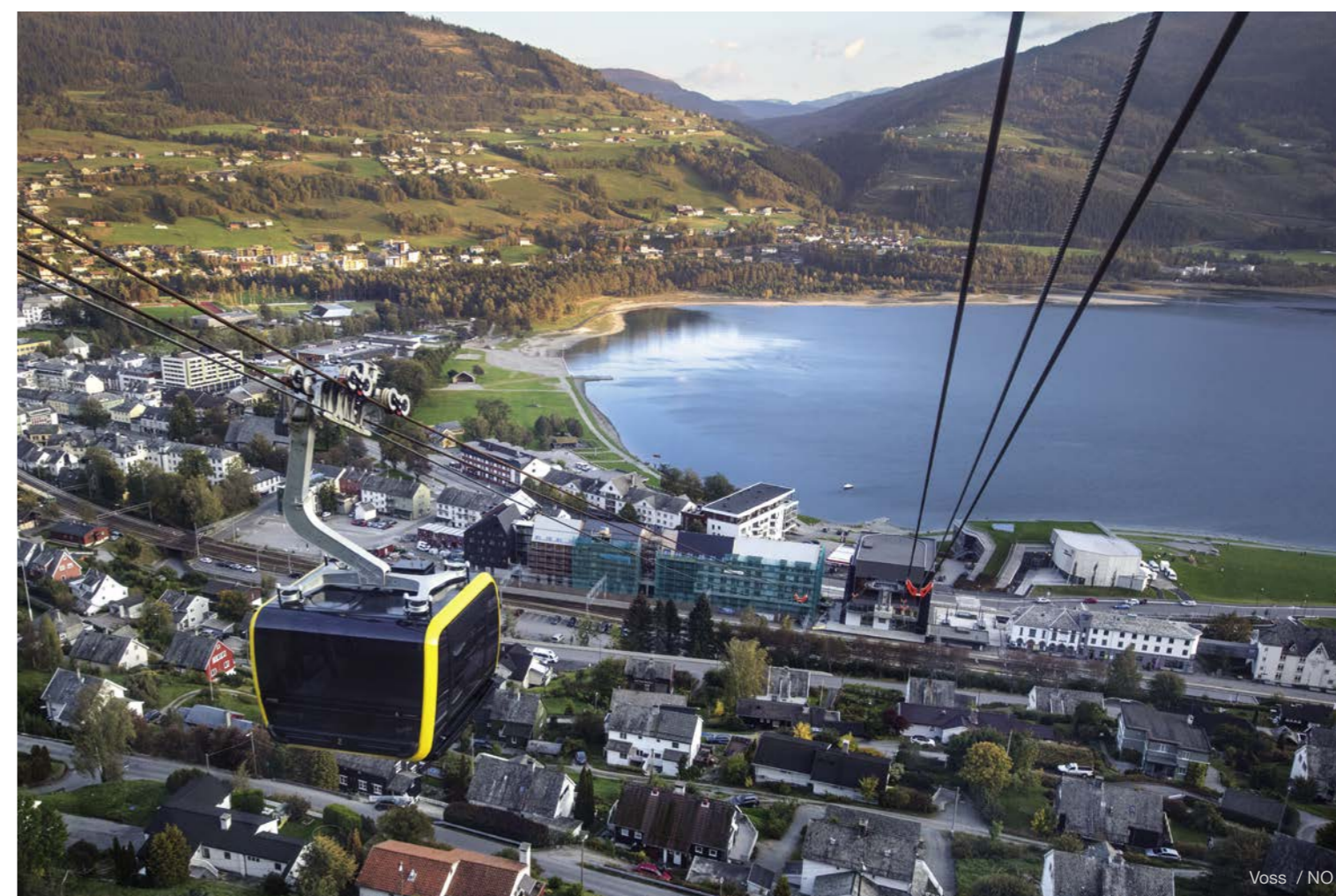
## Green mobility

Thanks to the new tricable gondola lift, the first of its kind in Scandinavia and the largest ropeway installation in Northern Europe, the traditional tourist destination of Voss is back in the fast lane in exemplary fashion. The system LEITNER ropeways has installed in the popular hiking, excursion and ski resort on the local Hanguren mountain is at the heart of a green mobility strategy and is extremely important for the entire region. The ropeway forms part of a public transport hub that offers both local transport and railway connections in a single overall strategy. The bottom station has been integrated in the redesigned railway station, which includes a new bus station. This created a central traffic junction near the town center. A “Green Line” from the mountains to Voss should shift more traffic to the railways. The total

travel time on this route would then drop from almost two hours to 30 minutes. This should attract more day visitors and promote winter and summer tourism.

### TD34 Voss

Inclined length (total):	2,020 m
Vertical distance:	764 m
Speed:	5 m/s
Transport capacity:	1,069 p/h
Number of towers:	3
Number of cabins:	9



AUSTRIA – KITZBÜHEL

## Stylish, fast, economical

Following 35 years of accident-free service, the old “Fleckalmbahn” went into well-deserved retirement in spring 2019. Just eight months later, the world-famous Tyrolean winter sports resort of Kitzbühel presented a high-speed sensation. The new “Fleckalmbahn” is the fastest monocable gondola lift in Austria, traveling at 7 m/s. It features numerous technological and design innovations that guarantee maximum ride comfort and sustainability. The exclusive luxury cabins Symphony 10 from Pininfarina show what is possible today. Their dimensions exceed those of comparable cabins and they even boast a world first in comfort: the ergonomically designed single seats with leather covers and seat heating are furnished with heating elements at lower-back height for the first time. The

new “Fleckalmbahn” also proves the company’s commitment to sustainability once again. Using LEITNER DirectDrive, a resource-friendly and speed-controlled capacity management system, along with numerous other improvements provides energy savings of 75,000 kWh per year.

*The fastest*  
monocable gondola lift  
in Austria



Mt Ruapehu / NZ



Coronet Peak / NZ

NEW ZEALAND – MOUNT RUAPEHU &amp; CORONET PEAK

## Journey to the holy mountain

At Mount Ruapehu, one of the filming locations for the “The Lord of the Rings” cinema trilogy, a unique ropeway project was completed in the heart of the North Island of New Zealand: the “Sky Waka” gondola lift offers access to the ski area on the sacred mountain of the Māori iwi and is considered the most exciting tourist attraction in the country. The construction of the installation in the volcanic landscape of Tongariro National Park, which has dual UNESCO World Heritage status, was particularly challenging. For example, particular attention had to be paid to the positioning of the towers due to the possibility of future mudflows and debris flows (lahars). LEITNER ropeways was also busy working on New Zealand’s South Island building the Coronet Express II Telemix system in the New Zealand Alps, near the city of Queenstown.

### GD10 Sky Waka

Inclined length (total):	_____ 1,799 m
Vertical distance:	_____ 381 m
Speed:	_____ 6 m/s
Transport capacity:	_____ 2,400 p/h
Number of towers:	_____ 14
Number of cabins:	_____ 49



Kitzbühel / AT

# At the cutting edge

## ITALY – AN INCREASE IN COMFORT

The modernization of ski resorts for the 2019/2020 winter season proceeded at full speed in Italy. A total of ten new systems were built in South Tyrol, Veneto and Trentino. Pininfarina station coverings are in high demand. The LEITNER DirectDrive remains a sought-after component for numerous new projects.

Right in time for the upcoming 2021 Alpine World Ski

Championships and the 2026 Winter Olympics, a new 10-passenger gondola lift in the Tofana ski resort in Cortina d'Ampezzo provides a comfortable ascent to Col Druscié. It replaces the first section of the 50-year-old aerial tramway "Freccia nel Cielo" and significantly reduces waiting times for winter sports enthusiasts and spectators at sports events.



Obereggen / IT



Cortina d'Ampezzo / IT

The switch to a 10-passenger gondola lift has also been made at La Crusc in Alta Badia as part of the upgrade project for the ski resort. There are two new 8-seater chairlifts in use on Monte Elmo in the 3 Zinnen Dolomites and in the Obereggen ski resort, including a station in the modern Pininfarina design. LEITNER ropeways has also constructed four 6-seater chairlifts: the CD6 "Stella

Alpina" in Colfosco/Alta Badia, the "Wastenegg" chairlift with the Pininfarina station in the Ladurns ski resort, the CD6 "Cigolera" in San Martino di Castrozza, and the new "Melette" installation north of Asiago. In addition, LEITNER ropeways has completed a funicular in San Pellegrino Terme, replacing the old funicular, which has been in operation since 1909.



### AUSTRIA – IMPROVED MOBILITY IN THE ALPS

LEITNER ropeways has struck an innovative note in the area of air-cushion technology: the “U-Bahn” funicular in the Tyrolean ski resort Serfaus, famous for its revolutionary concept, has been brought right up to date in terms of ropeway technology. The installation has been kitted out with a new vehicle and is now in operation using the first LEITNER DirectDrive installed with a standing drive sheave. In Kals am Großglockner, guests benefit from the new 6-seater chairlift “Glocknerblick”, which brings them directly from the center to approximately 2,000 meters above sea level and makes it easier to access the slopes. The eye-catching bottom station is designed in an elegant Pininfarina style.

*Air-cushion  
technology*  
right up to date



Söllereck / DE



Serfaus / AT

### GERMANY, SWITZERLAND, FRANCE – CLASSICS REWORKED

The “Mitterkaser” 6-seater chairlift on the Jenner mountain in the Berchtesgaden Alps completes the new ropeway trio, which includes the identical “Jennerwiesenbahn” and the “Jennerbahn” 10-passenger gondola lift. Two new 6-seater chairlifts – “Schrödelsteinbahn” in the ski resort of Brauneck and “Schrattenwangbahn” in Söllereck – have also been put into operation. In Savognin in the Swiss canton of Grisons, a new 10-passenger gondola lift ensures perfect access to the skiing and hiking region and therefore adds quality to the entire holiday region of Surses. Two new chair-

lifts and a Telemix system, all equipped with LEITNER DirectDrive, were completed in France. In Avoriaz on the border with Switzerland, the new “Les Cases” 6-seater chairlift provides a reliable connection to Champéry in Switzerland. Another 6-seater chairlift in the Valmeinier - Galibier Thabor ski resort now offers access to the newly opened highest point of the ski resort, at 2,750 meters. A modern Telemix system is replacing the old 12-passenger gondola lift in La Forêt Blanche (Vars - Risoul) ski resort and ensures a comfortable ascent for both winter sports enthusiasts and walkers.



Turku / FI



Jahorina / BA

# Prospects for 2020

ITALY – CERVINIA, SWITZERLAND – ZERMATT

## Year-round connection

Zermatt in Switzerland is also becoming the center of attention again. After the implementation of the spectacular “Matterhorn glacier ride” tricable gondola lift, work is already being carried out to complete this major regional project. The key focus here is the construction of another tricable gondola lift between Testa Grigia and the Klein Matterhorn, to be opened for the 2021/2022 winter season. Therefore, the vision of an “Alpine Crossing” between Zermatt in Switzerland and Cervinia in Italy is becoming reality.



Zermatt / CH

### SCANDINAVIA – RIGHT ON TRACK

The Kakolanmäki hill in Turku is an exceptional place visible from miles around in the European Capital of Culture for 2011. On a site that until recently housed a prison, the Turku city administration is now building a modern residential area to be integrated into the transport network. The “Kakolan Funicolaari” inclined elevator transports 480 people per hour on a route 132 m long and with a vertical distance of only 30 m. It is fully automatic and free to use.

LEITNER ropeways was given responsibility for all the systems, a 6-seater chairlift over a kilometer long and six surface lifts, at the Idre Himmelfjäll (Sweden) family ski resort which opened in 2019. In Norway, two new surface lifts were installed in the winter sports center of Geilo and in Turufjell ski resort, north of Flå.

### TURKEY, SPAIN, NORTH MACEDONIA, BOSNIA – QUALITY EXPANSION IN THE SOUTH

Not only is the new 6-seater chairlift in the ski resort of Sarikamis a potentially record-breaking 1,850 meters in length, it is also the first Turkish winter sports facility to be equipped with LEITNER DirectDrive. The new “La Roca” 4-seater chairlift is the ideal way to travel up to the Esport Esquí family ski resort in the Catalan Pyrenees and the first to be equipped with LeitDrive in this region. A 6-seater chairlift is bringing modern technology to the traditional ski resort of Popova Shapka in north-west Macedonia. A fourth LEITNER ropeways installation is now in use in Jahorina, the former Olympic ski venue to the south of Sarajevo. A newly installed 10-passenger gondola lift is improving passenger transport in unfavorable weather conditions and should also help with making further use of the potential of the area in the Dinaric mountains as a summer and winter destination.



Zermatt / CH



Oberstdorf / DE

## More projects in 2020

When it comes to urban transport projects, the focus again shifts to Mexico. In the capital, Mexico City, two new interconnected gondola lifts by LEITNER ropeways will start operating in 2021, thus offering a secure connection between the existing subway stations in the district of Iztapalapa. The ropeways, equipped with 10-passenger cabins, along a route of 10.6 kilometers in total and over seven stations, will carry 3,000 and 2,000 people per hour/direction and system. In addition, LEITNER ropeways is building three more interconnected gondola lifts by the end of 2021 in the Ecatepec de Morelos area. Mexico's first urban ropeway has been in operation here since 2016.

New life is being injected into a real tourist attraction: with the revitalization of Barcelona's "Funicular del Tibidabo", which was constructed more than 120 years

ago on the mountain of the same name in the Catalan metropolis, passengers are being offered a completely new experience. Besides safety-related replacements, the speed of both carriages will increase from 4 to 10 meters per second, while capacity is also boosted from 120 to 252 people per journey. Thanks to the panoramic view, the interactive information in the carriage, and the futuristic lighting, ascending to the amusement park becomes an entertaining experience.

In Cortina d'Ampezzo (Province of Belluno, Northern Italy), LEITNER ropeways is getting ready to install a new gondola lift in preparation for the Alpine Ski World Championships 2021. The new ropeway will link the Cortina pistes with the Cinque Torri ski resort and is a further step toward a connection to the famous Sellaronda.

GERMANY – OBERSTDORF

## 2S ropeway on the Nebelhorn

Whether in the fields of winter sports, tourism or urban transport, a glance at upcoming projects shows that the variety of ropeway projects will remain unchanged as ropeways continue to grow in significance. The expansion of infrastructure in the Alps remains an important pillar. The Oberstdorf/Kleinwalsertal ski resort in Allgäu is an example of this. The investments being made in modern technology there are set to continue in spring 2020 with work on the new bicable gondola lift on the Nebelhorn. Complete with luxury cabins Symphony 10, the entirely re-worked bicable system will be celebrating its première in 2021.

AUSTRIA – SCHLADMING

## More comfort

There are also new upcoming projects in Austria, such as the new "Lärchkogel" 8-seater chairlift with the Planai-Hochwurzen ski resort in Schladming. A wider station roofing completely covers the moving chairs and provides perfect protection. The journey in the Premium Chair EVO with bubbles and seat heating is a comfortable experience. Thanks to increased capacity, soon almost 3,500 people per hour will be able to reach the three main slopes – Kraiterrabfahrt, Lärchkogelabfahrt and the World Championship slope. In addition, it is an important link to the chairlifts and slopes in the Planai summit area.



Mexico City / MX

# The pinnacle of mobility



At POMA, our expertise, our ongoing research and development and our determination to overcome obstacles are what enable us to push the boundaries of the possible. In 2019 we had several outstanding achievements, like the replacement of 4 ropes of 2 km each at a height of 3,195 m on the legendary Cime Caron ropeway or the construction of the Mokpo gondola lift in South Korea, which is 155 m above the sea. In Courchevel a gondola lift with EVO cabins gives passengers an extremely comfortable ride right through into the evening, while POMA is currently taking part in the construction of the new observation wheel in Dubai which will be the world's tallest at 250 m and is certain to become a magnet for visitors.

Our 80 years of experience and pioneering spirit guarantee the successful completion of our projects and enable us to win the trust of our customers. We focus on the needs of passengers and of our customers from the initial planning phase right through to the implementation. At POMA we help operators to find the right balance between environmental concerns and transport requirements. Solar cells installed on the station roofs and intelligent data management are just two of the many optional extras that are available.

More major projects will be completed in 2020, including the longest 3S system in France for the city of Toulouse, a triple 3S system in the huge Zhuhai leisure park in China, and a 3S system that connects the peaks in the Russian ski area of Veduchi.

POMA

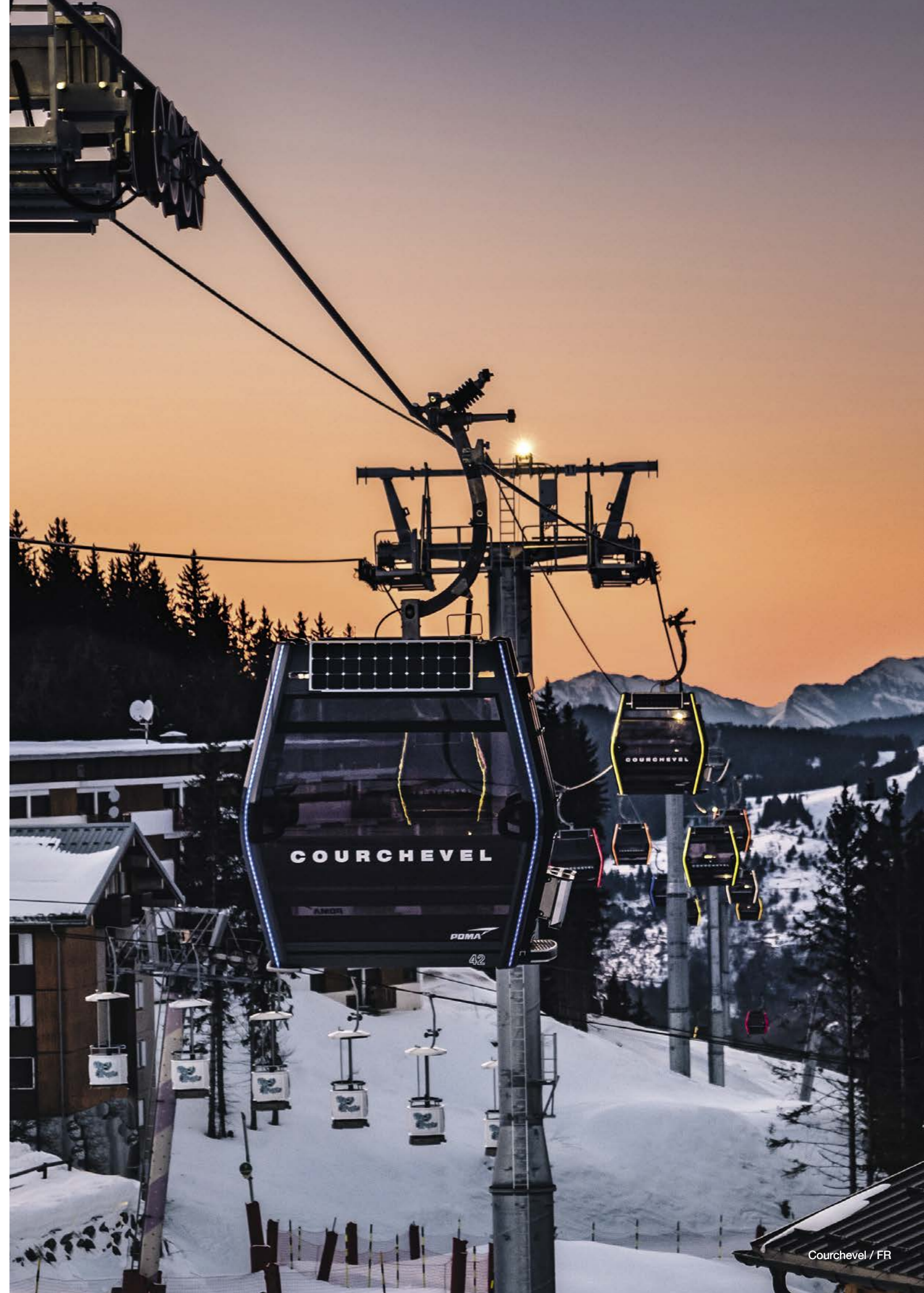
FRANCE – COURCHEVEL

# An all-year-round connection

Following the success of the system implemented in Grangettes, POMA was awarded another contract by the Société des 3 Vallées. The new gondola lift connects the Courchevel ski resort and the village of Le Praz with the new Alpinium “multi service” building, which includes a large parking lot. This is a comprehensive solution designed for all-year-round transport. During the ski season, skiers, residents, and rescue workers can easily reach the center of Courchevel 1850. In summer the gondola lift takes visitors to the lake in Le Praz. A DirectDrive system, which is both powerful and environmentally friendly, and elegant EVO 10-passenger cabins with solar-powered LED lighting provide a luxury solution for both the passengers and

the operator. A ride in the exclusive L'Instant Merveilleux cabin, which can be privately hired, is an unforgettable experience. During the Alpine Ski World Championships, which are being held in Courchevel in 2023, this system will be the main means of transport for spectators and athletes alike.

Capacity/direction:	2,400 p/h
Vertical distance:	478 m
Length:	2,030 m
Number of cabins:	47





Mokpo / KR

SOUTH KOREA – MOKPO

## A spectacular ride across the water

It was the major commercial success of the gondola lift built by POMA for Yeosu in 2014 that led to the construction of another attraction in Mokpo. Passengers in the new gondola lift can enjoy the fascinating experience of a trip across the sea to the island of Gohado. The view is breathtaking, in particular in the cabins with glass floors. There are no towers in the sea to support the gondola lift, which has the world's longest span width of a POMA monicable gondola lift between two towers (1.2 km). The 150-m-high concrete tower is the highest tower ever built for a monicable gondola lift. One special feature of the system is the middle station where the direction of travel changes

by 68° so that passengers can travel to the city of Mokpo after crossing the water. The gondola lift floats high above Dalseong Park and preserves the natural beauty of this walkers' paradise with its twelve monumental Yudalsan sculptures.

Capacity/direction: \_\_\_ 1,200 p/h  
Vertical distance: \_\_\_ 220 m  
Length: \_\_\_ 3,341 m  
Number of cabins: \_\_\_ 55

COLOMBIA – MEDELLÍN

## A key connection

The "Línea M" is the fifth gondola lift that the city of Medellín has added to its Metrocable transport network. It transports 2,500 passengers per hour and allows the 350,000 residents in the east of the city to reach the center quickly. The "Línea M" is a key element in the local transport network and part of the Corredores Verdes (green corridors) project. Together with the existing streetcar and the "Línea H" gondola lift that was opened in 2006, the new system integrates another district of the city into the Metrocable network. The sixth system, "Línea P", is currently being built in the northwest of the city and will be the first urban gondola lift in the world with 12-passenger cabins. POMA

has played an important role in the construction of the transport network since 2004. The Metrocable network has already transported more than 270 million passengers throughout the city and sets global standards for sustainable transport and social integration.

Capacity/direction: \_\_\_ 2,500 p/h  
Vertical distance: \_\_\_ 275 m  
Length: \_\_\_ 1,057 m  
Number of cabins: \_\_\_ 49



Medellín / CO

# Successful systems worldwide

## FRANCE – VAL THORENS ENGINEERING EXPERTISE IN LES 3 VALLÉES

The modernization of the legendary Cime Caron gondola lift in Val Thorens was extremely complex from a technical perspective. POMA needed to take a number of special measures in order to be able to work safely and efficiently. For example, a 60-ton winch had to be installed on the mountain to pull the four new carrying ropes with a total length of 2 km and a total weight of 62 metric tons into place. The Cime Caron gondola lift was reopened at the start of the 2019 season to give access to Europe's highest ski area at a height of 3,195 m on the Mauriennais d'Orelle.

## FRANCE – SERRE CHEVALIER INTEGRATED PHOTOVOLTAICS

The ski resort of Serre Chevalier will be using hydroelectric power, photovoltaics, and wind energy to generate 30% of the entire electricity consumption in the area. The new Eychauda 6-seater chairlift is making an important contribution to these efforts. The photovoltaic panels on the roofs of the stations generate a significant amount of the energy needed. An innovation developed by POMA has allowed solar panels to be fitted in place of the panes of acrylic glass. Another environmentally friendly move was the reuse of the POMA chairlift dating back to 1998, which will be installed in another location in the ski resort.



Serre Chevalier / FR



Val Thorens / FR

## FRANCE – PRA LOUP COSTEBELLE REVIVAL

The Costebelle gondola lift provides important access to the Pra Loup ski resort. As part of a major project to redesign the entire ski area, the gondola lift with 6-passenger cabins, which had been built in 1983 and was recently shut down, has been completely renovated. The system has been updated to comply with current standards and provides the operator with the highest levels of safety and ease of maintenance. The performance of the gondola lift is equivalent to that of a new system, increasing its comfort, speed and capacity.

## FRANCE – LES SAISIES NEW GATEWAY TO ESPACE DIAMANT

In the model ski resort of Les Saisies, which has a 360° panoramic view of Mont Blanc, POMA has replaced the 4-seater La Legette chairlift, which has been in operation for 20 years. The new detachable 6-seater chairlift has been designed to blend into the landscape and is

the new gateway to the neighboring ski resort of Espace Diamant. Moving the valley station next to the parking lot and building two ski tunnels has made it possible for skiers and snowboarders to reach the ski area in half the time.

## FRANCE – LE GRAND-BORNAND TAILOR-MADE CONFIGURATION

During the restructuring of the ski slopes in Le Grand-Bornand, two chairlifts were replaced with the Les Charmieux 6-seater chairlift, which is a modern, detachable system. This has resulted in much shorter ascent times. The new location of the top station also gives easier access to the entire ski area and, in particular, to the new beginners' slopes. The special configuration of the stations at a 45° angle meets the technical requirements of the ski resort and allows the maximum capacity of the station to be used, even in summer visitors can benefit from it. In addition, the towers play special sound and light effects at the many evening events.

**RUSSIA – ARKHYZ  
SKIING HOTSPOT IN THE CAUCASUS**

The Northern Caucasus Resort (NCR) is continuing a development in the Caucasus Mountains that was started in 2011. Following the construction of a fixed 4-seater chairlift, an 8-passenger gondola lift, and a 6-seater chairlift with bubbles on the south side of the resort of Arkhyz, the NCR is currently modernizing the architecture in the center of the resort. An impressive 10-passenger gondola lift with 101 Diamond cabins has been installed in the northern part of the village. It reaches a height of 2,505 m over a distance of 3.8 km in three sections.

**USA – ALPINE MEADOWS  
WEATHERPROOF AND SPECTACULAR**

LEITNER POMA of America is a long-term partner of the Alpine Meadows ski resort and replaced the 1996 Hot Wheels system with a new and more powerful detachable 4-seater chairlift. The route of the chairlift has changed slightly and the Treeline Cirque, which is equipped with bubbles, now reaches Sherwood Ridge in five minutes, including an additional 400 m climb. The slopes, which offer a spectacular view of Lake Tahoe, can easily be reached from there. The former top station has been turned into the middle station and allows skiers, hikers, and cyclists to get to the slopes and tracks more quickly.



Patnitop / IN



Arkhyz / RU

**INDIA – PATNITOP  
UP TO THE TOP WITH SKYVIEW**

Patnitop in the state of Jammu and Kashmir has set itself the goal of becoming one of the foremost tourism regions in the north of India. The pleasant climate, beautiful natural setting, many tourist attractions and proximity to the cities of New Delhi, Chandigarh, and Amritsar make it ideally suited. The newly constructed Skyview Patnitop ropeway, which is the centerpiece of a major project consisting of a

leisure park, hotel complex, and extensive range of visitor attractions, brings the holiday resort one step closer to its goal. The journey on one of Asia's highest ropeways above the pine forests to the mountain restaurant with breathtaking views is the highlight of a visit to Patnitop. There were major celebrations when the new ropeway was opened in the spring of 2019.



# Prospects for 2020

## UNITED ARAB EMIRATES – DUBAI

### THE LARGEST OBSERVATION WHEEL IN THE WORLD

With a height of 250 m, the Ain Dubai observation wheel is the tallest in the world and offers unique views of the city skyline. It is located on the artificial Bluewaters island off the coast of the Jumeira Beach resort. POMA is supplying the capsules for the observation wheel in Dubai as it did for the previous recordholders in London and Las Vegas. The contract was awarded on the basis

of POMA's international reputation and innovative ability. An international project team was put together to plan, manufacture, and install the cabins. It has brought together all the company's experience and guarantees that the project will be completed in record time. The 48 luxurious capsules, each of which has room for 40 passengers, will be installed in 2020.



Tizi Ouzou / DZ

## ALGERIA – TIZI OUZOU CABINS IN THE ALGERIAN SKY

In Tizi Ouzou, the second most populated city of Kabylia, an urban ropeway project is underway. The system consists of three sections – two gondola lifts and one aerial tramway – which together cover a distance of more than 5 km. The first section with a length of over 2.5 km came into operation in January 2020. The new ropeway is fully integrated into the existing bus and rail network and passengers traveling

in the 65 10-passenger cabins can reach their destination in comfort and with no stress in only eleven minutes. The four stations in the different districts of the city have been designed to blend in with their surroundings. ETAC, a joint venture between the Algerian state and POMA, is responsible for operating the ropeway and for recruiting and training the 100 staff members.



Dubai / AE

ECUADOR – GUAYAQUIL

## City high-flyer

The port city of Guayaquil is the financial center of Ecuador. On the other side of the Rio Guaya river is the town of Duran. The congested bridge between the two cities causes massive traffic problems, which has led the city authorities to look for an alternative and more sustainable solution. The 4-km-long Aerovia gondola lift will significantly improve urban mobility from 2020 onward. With 154 10-passenger cabins, it can transport 40,000 commuters across the river to the city on the other side every day and will reduce the traveling time from 45 to 17 minutes. POMA and SOFRATESA are continuing their partnership and have concluded an operation and maintenance contract covering the next 30 years.

FRANCE – LUZENAC

## Safe transport of materials

Imerys, the world market leader in mineral-based specialties, has awarded POMA the contract to replace the material ropeway that has been in operation at its talc quarry in Trimouns in southwest France since 1975. The new, ultramodern ropeway has been designed in close collaboration with the customer and is based on the same standards as a passenger transport system with a high level of safety. The central monitoring system automatically adjusts to the load. This new transport system with environmentally friendly DirectDrive will reduce the CO<sub>2</sub> emissions by the equivalent of a fleet of trucks making 20,000 return journeys per year.



Zhuhai / CN



Guayaquil / EC

CHINA – ZHUHAI

## Triangular trip with a 3S system

In 2020 the Chimelong Ocean Kingdom in Zhuhai will open an unusual ropeway that is the first in the world to consist of three 3S systems in a triangular configuration. With a total length of 4.5 km and more than 100 elegant Symphony cabins, each with 32 seats, this new system is sure to be a major visitor attraction. The leisure park offers the 8.5 million people who visit it every year a very special ride experience at dusk. The LED lighting system in the cabins bathes the park and the sky in a magical light.

RUSSIA – VEDUCHI

## Two-peak tour

The winter sports boom in Russia has now reached the ski resort of Veduchi. As a result, the Northern Caucasus Resort (NCR) decided to commission POMA to build its first 3S system in Russia, which is 4.3 km in length. The gondola lift will have a record span width of 2.8 km and will reach the highest peaks in Chechnya, connecting two of them together. The ropeway provides access to the ski resort and also functions as a tourist attraction, which gives it year-round appeal. In addition, it is only 1.5 hours away from the airport in Grozny.

# Groundbreaking technology



AGUDIO's positive upward trend also continued in 2019. A number of important new installations were put into operation last year, including a Flyingbelt in Germany and two cable cranes in Portugal. In addition, the company began planning an especially high-powered Flyingbelt for the construction of the world's tallest dam in Tajikistan.

Companies that score high on sustainability, reducing their environmental footprint, and minimizing costs are being favored by both public and private investors. AGUDIO boasts the knowledge and expertise needed to meet all of these requirements to optimum effect. Alongside technologically innovative solutions developed in line with the highest quality standards, AGUDIO's excellent reputation also rests on its absolute reliability.

When it comes to material transport solutions for dam construction and cement manufacturing, AGUDIO has set the international benchmark for years. Now it is increasingly also customers' first choice in the mining sector and for the transport of a variety of bulk materials.

# Transporting materials safely

## FLYINGBELT IN LIPPE, GERMANY RIVER CROSSING

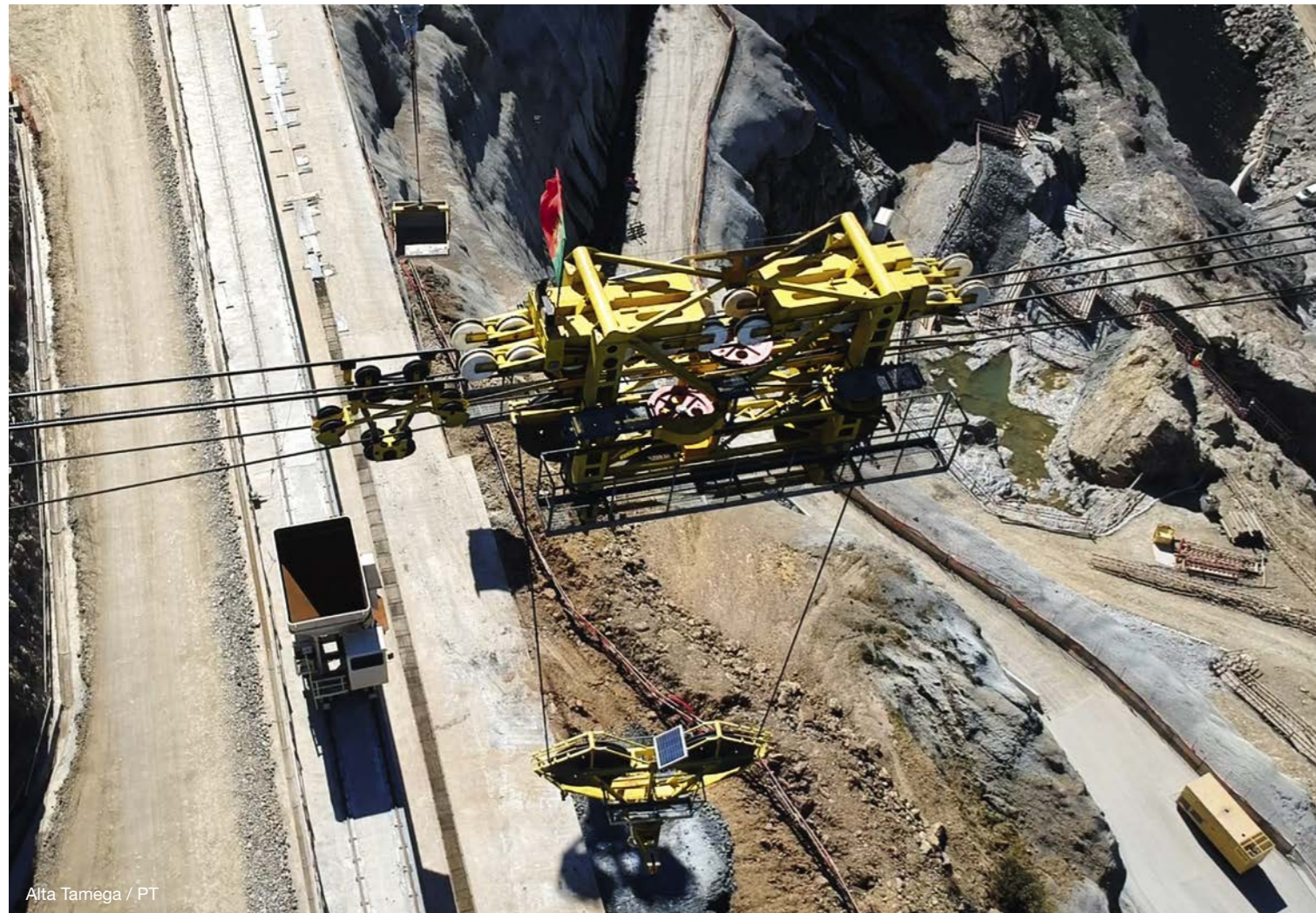
To enhance flood protection on the Lippe river in North Rhine-Westphalia, the affected communities of Haltern, Lippamsdorf, and Marl launched the HaLiMa project. In order to secure both riverbanks, large volumes of material needed to be transported across the river. In early 2019, a 490-meter-long Flyingbelt entered into operation during the first phase of construction. The system shifts 500 metric tons of building material per hour to the northern bank of the Lippe river, where further processing then takes place. This equates to a saving of 20 truck journeys per hour.

## CABLE CRANE IN ALTO TÂMEGA, PORTUGAL RELOCATION

In early 2019, two cable cranes entered into operation in Alto Tâmega that had previously been deployed during the construction of the Baixo Sabor dam in Portugal. On the Tâmega river, 75 kilometers from Porto, they are now helping to build a 105-meter-high and 335-meter-long arch dam. With a span width of 620 meters, the two parallel cable cranes operate at speeds of 8 m/s and have a load bearing capacity of up to 28 metric tons.



Adrianópolis / BR



Alta Tâmega / PT

# Outlook for 2020

2019 was not just a year for putting systems and installations into operation; it also marked the start of planning and construction processes for new, larger projects.

When completed, the Rogun dam in Tajikistan will be the tallest dam in the world. The company signed a contract with construction firm Salini Impregilo for an especially high-powered Flyingbelt with a capacity of 3,000 metric tons/hour. The transportation is carried out on a 1.4-meter-wide conveyor belt with a span width of 600 meters. The system is expected to enter operation toward the end of 2020.

In 2020, the Adrianópolis Flyingbelt in Brazil will connect a quarry directly with a cement plant. Boasting a span width of 850 meters, the system will cross a valley at a total length of 1,700 meters. The conveyor belt is 80 cm wide and will transport 900 metric tons of limestone per hour.

Meanwhile, the radial cable crane used to construct the Gibe III dam will be redeployed to the Koysha dam construction site in Ethiopia, where it will have an upgraded transport capacity of 35 metric tons.

# Heading for success

*Prinoth*

In 2019, PRINOTH posted yet another record year across all three divisions and further increased its market share. The company achieved global growth in the snow groomer segment. The PRINOTH fleet, including the LEITWOLF, BISON and HUSKY models, impressed customers around the world with its outstanding performance and reliability. Digital solutions linked to SNOW HOW are also currently enjoying great popularity: more and more customers are relying on this powerful and user-friendly PRINOTH software.

The Vegetation Management segment also saw a steep upwards curve thanks to mounted and carrier vehicles. Strong sales figures in the North American and European markets are particularly noteworthy. PRINOTH mulchers were in demand in 2019, especially in Central Europe, and the Russian market also developed stably despite challenges.

With demand remaining consistently high, 2019 offered many new opportunities for PRINOTH tracked vehicles to underpin their excellent reputation for customer-oriented vehicle solutions. Throughout the TROLL project, for example, the company presented a vehicle that is unique in the world and is designed to transport very large loads with few personnel in the Antarctic. In addition, the PANTHER T7R – the latest addition to the tracked vehicle portfolio – was presented at the Bauma trade fair in Munich.

# Snow groomers

PRINOTH snow groomers offer outstanding reliability and performance. PRINOTH builds upon its reputation as a technology leader for efficient and sustainable slope management by introducing Stage V clean engine technology. The internationally successful X fleet of PRINOTH park vehicles has been supplemented by the HUSKY X: a vehicle tailored to the requirements of customers with smaller parks. Customer focus and proximity – from product development to service offers – are representative of PRINOTH and appreciated by partners all over the world.

#### PRINOTH snow groomers

- + Efficient and sustainable slope management
- + Broad product portfolio
- + Intelligent solutions for every application
- + Low emission values



PRINOTH SNOW HOW



BISON X

SNOW HOW

## Precise data for detailed analysis

With SNOW HOW, PRINOTH offers an intelligent software solution consisting of in-house developed fleet management and snow depth measurement from Leica Geosystems. In addition to both high-quality technical offers – which can be used either as a stand-alone solution or as a package – SNOW HOW is particularly impressive given its highly practical implementation. Not only is the clearly presented single-user interface convincing, but so too is the rapid transfer of valuable

data material in real time. In addition, SNOW HOW also demonstrates its strengths in interaction with other applications. The product can thus be perfectly integrated with the Skadii ski area management solution. This, in turn, provides the basis for embedding programs from other developers, therefore providing a complete view of all control areas within a ski resort using a single software solution.

## AFTER SALES

## Even closer to customers

In the past year, the PRINOTH AFTER SALES NETWORK has implemented several projects that simplify processes and order processing, and offer customers an even faster and more comprehensive service. For example, PRINOTH technicians can now carry out repair work on MTU and in some cases CAT engines during the warranty period. In addition, AFTER SALES logistics centers have been extensively modernized, allowing for

maximum efficiency and speed in order processing. The revised spare-parts pricing strategy further extends the usual advantages of original PRINOTH spare parts: the fairest price with best service and fastest availability. Moreover, many steps have been taken in 2019 to offer PRINOTH customers an even more modern, attractive and comprehensive training program starting this year.



World Championships Åre 2019 / SE

## EVENTS

## Partner for large events

PRINOTH once again stands out as a reliable, first-choice partner for major winter sports events, including the 2019 Alpine World Championships in Åre, Sweden and the Nordic World Championships in Seefeld, Austria. The first-class racing piste conditions were praised by representatives from FIS, among others. PRINOTH quality is increasingly gaining acceptance and is admired for

the efficiency, reliability and versatility of the portfolio. Furthermore, the first-class support provided on site during events, including from PRINOTH operators and customer service, is appreciated by partners worldwide. In 2019, PRINOTH also won the official slope grooming tender for the 2022 Olympic Games in Beijing.



PRINOTH AFTER SALES

# Tracked Vehicles

The year 2019 continued to provide PRINOTH with a steady growth for its tracked vehicles business. Investments in infrastructure in both US and Canada, as well as in many European countries are creating strong demand for specialized construction equipment. A multitude of innovative applications where PANTHER vehicles are used has also allowed us to stand out and to introduce new vehicles in the market. Furthermore, with a growing fleet, we have experienced increasing opportunities for service and spare parts sales for the dealers.

**PRINOTH Tracked Vehicles**

- + International growth
- + Innovative and efficient vehicle solutions
- + Reliable service thanks to better infrastructure
- + PANTHER T7R – named as one of the year's "Top 100 Products"



PANTHER T7R



TROLL project

PANTHER T7R

TROLL PROJECT

## Powering Productivity

During a very successful BAUMA tradeshow in Munich, Germany, the PANTHER T7R was introduced to the market and right away, orders for the new rotating dumper started coming in. The first units were delivered in the fall of 2019 and customers have shared a great level of satisfaction. The PRINOTH PANTHER T7R is set to redefine the standards for tracked dumper productivity & cost effectiveness, and so we are proud to add this remarkable new vehicle to an already impressive product offering. With its design & engineering guided from the ground up by those who know our vehicles best: our customers - the PANTHER T7R goes well beyond technological innovation, delivering a payload capacity on par with the industry, and an overall speed that literally leaves the competition in its tracks.

## Challenge Antarctica mastered

PRINOTH unveiled a vehicle unlike any other in the world designed to transport very large loads with less personnel in Antarctica for Troll, the Norwegian Antarctica Station. The key objectives were to reduce overall operational costs through lower fuel consumption, reduce total time of transport and minimise the number of people dedicated to transporting fuel and goods. The PRINOTH brand name is associated with high quality solutions for off-road applications. With this particular project, we demonstrated our capacity to develop complex vehicle solutions that are ambitious, highly specialized and in some cases ground-breaking, yet keeping safety and reliability as our paramount priorities.



PANTHER T16



# Vegetation Management

PRINOTH GmbH continued to gain ground in the segment: an excellent business year, product enhancements in the hydraulic attachment market and the expansion of the sales network contributed to strong growth. This also strengthened PRINOTH as a key employer in the Lake Constance region around Herdwangen, a hotspot for companies in the automotive industry. Investments in modern machinery and automation projects led to increased efficiency in production processes. PRINOTH in Cuba became a real flagship project: here, PRINOTH is the first manufacturer to offer a solid, reliable solution – also in the long term – to control marabou weeds, whose drastically reduced stock

can be used as an alternative, sustainable fuel after further processing. A success story benefiting humans and nature!

#### PRINOTH Vegetation Management

- + Customer-oriented solutions and product enhancements in the hydraulic sector
- + Strengthening and expanding the distribution network
- + Key employer in the Herdwangen area
- + Increased efficiency thanks to automation and new machines



M450h-1450

M450H-1450

## Finest mulch material

The brushwood mulcher with a working width of 1450 mm has been specially developed for mounting on radio-controlled implement carriers, but this compact mulcher is also ideally suited for other hydraulic carrier vehicles. Thanks to the exchangeable counter blades in the housing, the material is also shredded. The BCS (“Bite Control System”) guarantees an optimum cutting pattern. The models cover a capacity range of 60-110 l/min and are ideally suited for green space and landscape maintenance, as well as municipal applications.



M450e-1090 excavator mulcher

M450E-1090 EXCAVATOR MULCHER

## Plug & Mulch

In addition to traditional mechanical attachments, especially for tractors, PRINOTH has been focusing on the hydraulic segment in recent years. The latest PRINOTH-designed mulching head used as an excavator attachment is the M450e-1090. It covers a range of excavators from 8-15 t, as well as carrier vehicles with outriggers up to max. 90 hp, thus extending the capacity of the M450e-900, which is used up to 12 t, mainly in the horticulture and landscaping sector. The power requirement is reduced by two-stage counter blades at the material intake, which prevent the rotor from being blocked by large drawn-in pieces of wood. Thanks to the gear motors used, no leakage oil line is required – the machine can thus be attached to any excavator outrigger without any additional conversion measures: “Plug & Mulch”.



RAPTOR 500

# Snow 4.0



## SNOWVISUAL 4.0



2019 heralded a new era for DEMACLENKO. By moving into its new headquarters in Vipiteno, Italy, the company laid the foundations for continued growth and created new scope for leading the way on innovations in the snowmaking sector. The new headquarters are located next to DEMACLENKO's sister companies LEITNER ropeways and PRINOTH. The shared location is therefore home to the world's only winter sports technologies hub.

Despite the relocation – and thanks to its precision planning – the brand once again produced more than 2,000 snow guns in 2019, which were then sold all around the world. This shows that DEMACLENKO's products and all-in-one solutions have proven their worth and won over customers on the international stage. In 2020, the bar will be raised even higher with the launch of the Titan 4.0.

In addition, continual investment in research & development is now set to reflect the steadily growing trend of digitalization. Most notably, the DEMACLENKO visualization software Snowvisual 4.0 guarantees fully automatic control of snowmaking systems, offering ski resorts the most resource- and cost-friendly operation possible.

2019 PROJECTS

## Snow of the future

### STRONG PERFORMANCE – TITAN 4.0

2020 has some radical innovation in store for the snow-making market as DEMACLENKO is set to raise the bar with the Titan 4.0. While new standards were already set back in 2017 with the Ventus 4.0, DEMACLENKO is now reaffirming its pioneering spirit with a complete overhaul of its bestseller. The new machine is impressive not only in terms of its fine Pininfarina design, but, above all, thanks to its technological sophistication. Boasting a water flow of 12 l/s, the Titan 4.0 is the most powerful

snow gun on the market, able to produce snow at a rate of 120 m<sup>3</sup>/h. At the same time, its total power consumption has been reduced to just 24 kW, thus cutting the machine's heat output by 40%. This saves precious resources. Thanks to sophisticated fine-tuning, the Titan 4.0 performs better than ever in the marginal temperature range. Likewise, the machine's noise emissions have been greatly minimized.



New headquarters in Vipiteno / IT

NEW HEADQUARTERS IN VIPITENO

## Concentrated innovation

DEMACLENKO is pushing ahead with its expansion: by moving into its new headquarters in Vipiteno, Italy, next to its sister companies LEITNER ropeways and PRINOTH, the technological leader in the snowmaking sector is proceeding along its path to success, providing an ideal foundation for continued growth. The new headquarters consists of a new office building, a large production hall with its own welding shop, a showroom,

and a (partially covered) outside area featuring a testing stand for putting the machines through their paces. The company is now able to focus more strongly on the uncompromising quality of its products and solutions, which are becoming more efficient, resource-friendly and sustainable every year thanks to strong investment in research & development.



Titan 4.0

**STRONG PRESENCE IN THE CORE ALPINE MARKET**

In 2019, winter sports hotspots in the Alps once again made extensive investments in technical snowmaking – and numerous ski resorts chose to rely on DEMACLENKO's expertise. One of the most prestigious projects of the year was implemented on the world-famous Saslong slope in Val Gardena. Other major projects were completed with the ski resorts of Gitschberg-Jochtal and Plose in Italy. A further highlight was the modernization of the technical snowmaking system of the Oberstdorf sports facilities ready for the 2021 Nordic World Ski Championships. Also in Austria, systems were built and modernized in Gargellen, Nassfeld, Axamer Lizum, Murtal and Kappl, for instance. With projects in Les Menuires, Les 2 Alpes, Les Gets and Praz de Lys, DEMACLENKO has also strengthened its market position in France.

**GAINING GROUND WORLDWIDE**

The new DEMACLENKO branch in Poland has already met with success in Eastern Europe, establishing important contacts and handling projects. Likewise, several major projects were completed in Scandinavia last year, for example at the Stranda, Geilo, and Tänndalen ski resorts. Demand for DEMACLENKO's all-in-one solutions grows year after year, and not just in Europe. It has secured contracts in South America, the USA, Russia, China, Japan, Australia, and New Zealand. Major projects have already been implemented in places such as Powderhorn (USA), Las Leñas (Argentina), and El Colorado (Chile). A dynamic network of branches and sales partners around the globe provide local customers with direct points of contact and guarantee a smooth-running supply chain.



Gitschberg / IT



Saslong / IT

# Outlook for 2020

Thanks to its new headquarters, the company will now be able to pool its strengths more centrally and push on with its global internationalization campaign. Thanks to excellent customer service, a number of projects have already entered the planning stage this year and will start operating from next season onwards. These

include projects at the Wildkogel Arena, Söllereck, and Valchiavenna ski resorts. In 2020, the focus will again be on optimizing the company's broad product range based primarily on a proven combination of performance, technology, and design, and with an emphasis on sustainability.

# Propelled by wind power



LEITWIND's hard work and tremendous commitment were rewarded in 2019 as several new contracts landed: with the first LEITWIND wind turbine being installed in Greece by as early as February. That particular turbine was a LTW101, which, with an output of 3.0 MW, is one of the largest and most powerful of its kind in the LEITWIND portfolio. This installation opened the doors to the Greek market, with LEITWIND subsequently undertaking a further three contracts comprising a total of nine wind turbines. Spring then brought with it the installation of the first LTW42, LEITWIND's "little" wind turbine, whose prototype is now standing proud in Steinfeld, Germany.

There is also some great news to report from Research & Development: the central investment policy is based on a clear growth strategy aimed at securing our market position and exploiting new niches in the market. In 2019, the LEITWIND team developed a wind turbine with blades that can withstand extremely strong winds (up to hurricane strength). These new blades are used on the Typhoon class LTW80 systems, which are being installed for the first time on the island of Guadeloupe.

Further investments were also made at LEITWIND Service Srl and the new branch in the Italian province of Avellino has taken on various activities since the start of 2020.

## Harnessing the wind

### LEITWIND SERVICE – EXPANSION IN ITALY

The new LEITWIND Service Srl (LTWS) site is designed as a hub for maintaining LEITWIND wind power plants in Apulia, Basilicata, Campania, Molise, and Abruzzo. This is a service LEITWIND has been providing ever since late 2012. In May 2019, encouraged by the healthy order level and rising sales, LTWS acquired a 18,000 m<sup>2</sup> plot in Lacedonia (Italy) with a hall covering 2,300 m<sup>2</sup>. Going forward, the new site, which was opened in January 2020, will serve as a base not only for existing business areas, but also for new fields of activity such as workshops, halls for reprocessing wind turbines, production and logistics.

### TYPHOON-RESISTANT BLADES

One of LEITWIND's objectives in 2019 was to develop a wind turbine with blades that could withstand the kind of extreme winds (up to hurricane strength) seen in the Caribbean rainy season. The new LS39-H blade is designed for use on the "Typhoon" version of the LTW80 wind turbine – currently one of the most reliable on the market. The first six Typhoon GL A class LTW80 turbines, boasting an output of 1.65 MW and a hub height of 48 meters, are being installed on the island of Guadeloupe, where they will be exposed to extremely high winds with gusts of up to 70 m/s (250km/h). The loading capacity and safety of the new blades have been tried and tested at the Wind Technology Testing Center in Boston (USA), passing all tests with flying colors.



LTW42, Steinfeld / DE

## Outlook for 2020

### POMA LEITWIND – ACHIEVING SUCCESS TOGETHER

POMA's "made in France" LEITWIND technology is attracting a great deal of interest from numerous French operators. The company manufactures components for wind power plants at its new production facility in Gilly-sur-Isère, focusing primarily on the main frames needed for the project on Guadeloupe and various contracts in Italy. POMA and LEITWIND have joined forces to produce the high-power versions (1.65 and 1.8 MW) of the tried-and-tested LTW80 with a lower tower (48 and 50 meters) for the French market, thus making it possible to implement projects that would have been impossible to realize before due to height restrictions. More and more operators are showing an interest in the LTW62 in IEC wind class I with a power output of 1.5 MW, which is distinguished by its moderate height and its suitability for use in very windy locations. Although it is not a standard product, POMA LEITWIND offer it on a custom-made basis upon request. Promising negotiations with new customers are pointing towards a successful year for POMA LEITWIND in 2020.

### STRONG GROWTH IN GREECE

LEITWIND took its first step into the Greek market in February 2019 with the installation of a LTW101 turbine with a power output of 3 MW, the largest wind turbine the company has to offer. Over the course of the year, it landed a further three contracts comprising a total of nine wind turbines. Two LTW80 systems with a power output of 1.5 MW and an 80-meter hub height are being supplied and installed in central Greece. Meanwhile, the D4.1 generator is being used for the first time in the installation of four LTW90 wind turbines with a hub height of 65 meters and a useful output of 1.5 MW in Western Macedonia. This generator, which measures 4.1 meters in diameter, is even bigger and more powerful than its predecessor, the D3.0. Three LTW80 turbines with a power output of 1.5 MW and a hub height of 50 meters are being installed on the Gulf of Corinth. LEITWIND won this contract on the strength of its flexibility, its product customization, its short lead times, and its guarantee of installing the wind turbines by the end of 2020.



LTW101, Alexandroupolis / GR

# Digital perspective



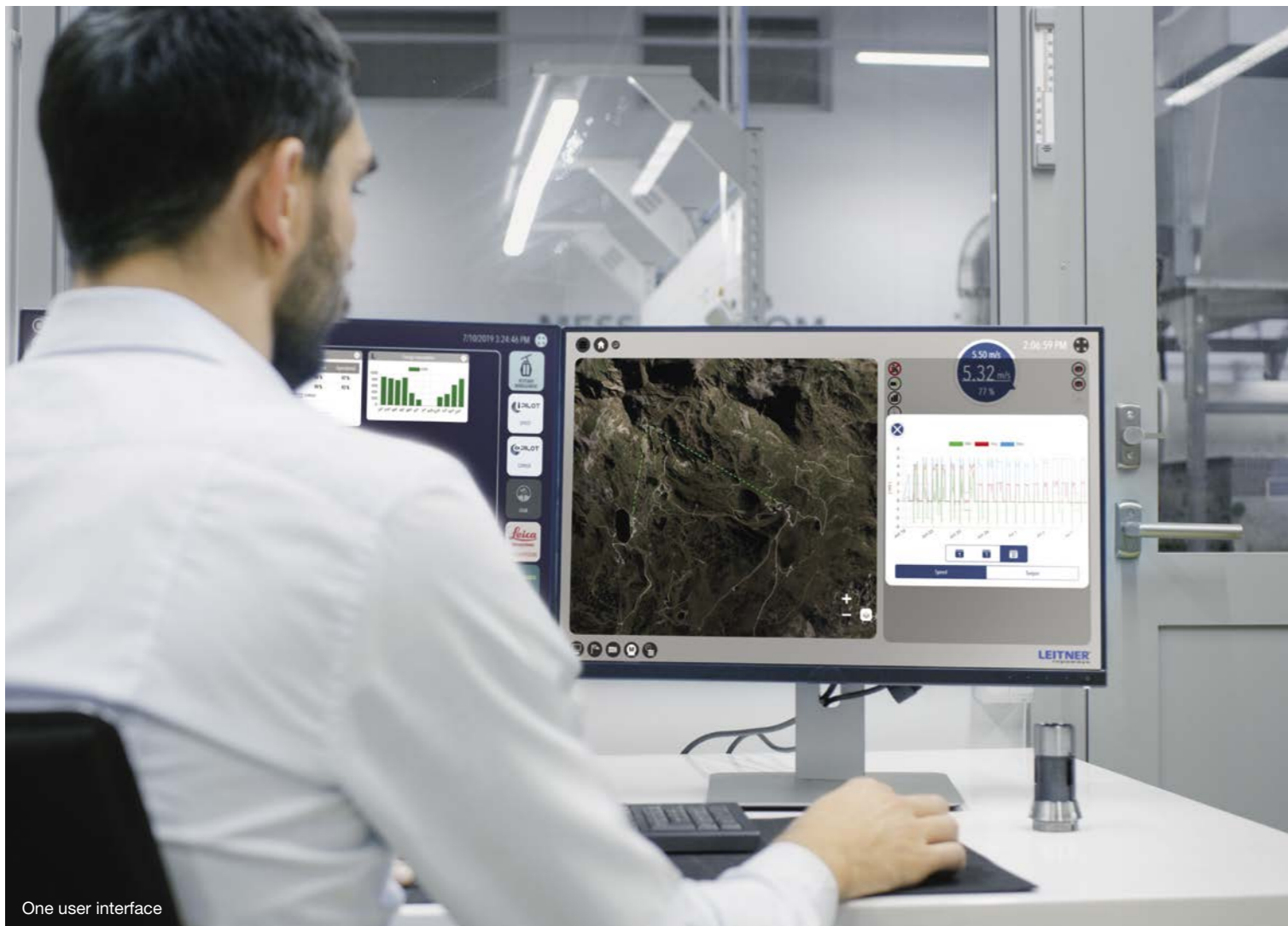
More efficiency, more user friendliness, more information in real time – cutting-edge technology needs digital excellence. In the area of digitization, our Group's innovative strength once again came to the fore. HTI Digital marked the foundation of a division that unites the digital developments and technologies of the individual business areas. The synergies arising from the cooperation between and experience of the different business units ensure that our Group is fighting fit for the future. With its latest innovation, HTI Digital has launched a new era in efficiency on the mountains. Skadii, the new resort management platform, allows operators to manage ski resorts easily and efficiently through a single access point.

**SKADII – THE RESORT MANAGEMENT TOOL OF THE FUTURE**

HTI Digital's new resort management platform Skadii – named after Skadi, the Norse goddess of winter – was met with great acclaim at its first presentation at the InterAlpin trade show in Innsbruck in 2019. And this praise is well deserved, with Skadii offering operators of ski areas a whole host of new possibilities. All relevant operational data can be compiled onto a single, easy-to-use interface and monitored in real time – be it on desktops and notebooks or on mobile devices. This allows operational decisions to be made independently of location and time. During the last winter season, Skadii already began to be put to use in some ski resorts.



Efficient management



One user interface

**DIGITAL FLEXIBILITY**

As an open platform, Skadii offers the decisive advantage that hardware and software data from third-party providers can be easily integrated. This provides a more comprehensive overview of ski resorts than has been previously possible – with everything from ropeways, snowmaking systems and snow groomers to the weather viewable in one glance. Operators are informed automatically of any deviations from the specifications or of any changes, allowing them to take immediate action. Anything that needs to be displayed can easily be individually configured on the platform. HTI Digital's forward-looking platform solution paves the way for efficient, convenient management on the mountains, guaranteeing a high degree of flexibility and complete data security.



# Staying ahead through responsibility

Our Group's momentum is not only contingent on the innovative strength and dedication of our 3,814 employees and considerable investment in research & development. It also matches our philosophy to keep a healthy balance between ecological, economic and social aspects – allowing us to fulfill our responsibility towards people and environmental sustainability. We create company values that will stand the test of time and safeguard our future. With this in mind, we are committed to giving best possible training and development to our employees and their healthcare. We make sure that our products are energy-efficient right from the development stage. Furthermore, we are continuously looking for ways to optimize our manufacturing processes to reduce our CO<sub>2</sub> emissions as much as possible. We believe firmly in acting responsibly, a topic that has always been important to us, and which is now becoming even more so.

# Progressing with confidence

## GREEN INITIATIVE

Our Group initiative at our headquarters in Vipiteno demonstrates what acting considerately means for us on an everyday basis: All employees were provided with a glass bottle to be able to use the new water dispensers and beverage vending machines to avoid unnecessary plastic consumption. Reducing plastic waste is a way for each of our employees to do their bit to protect the environment. There are also plans to roll out this initiative in more of our locations.

**60,000**  
*plastic bottles*  
saved at the Vipiteno  
site annually



“Healthy back” course



Glass bottles for employees

## PROMOTING HEALTH

Our employees are particularly eager for workshops and training courses covering health-related topics. The “healthy back” course determines the optimal posture for every participant at their workstation, promoting healthy posture. This same objective was behind the “Muscle awakening” training, a ten-minute training session carried out by specially trained sport coaches aimed at reducing the risk of musculoskeletal disorders during physical exertion. In addition to prevention, we also encourage physical, mental and spiritual development by offering seminars showing relaxation techniques through body scans, breathing exercises and even yoga. Another important topic is covered by the course “Staying healthy during the day – eating a balanced diet during everyday working life”.

# Commitment to people

## MOTIVATE, SUPPORT, TRAIN

Our employees are our biggest source of pride – their efforts, commitment and competence allow us to stay one step ahead. We promote the potential of our employees around the world by offering a wide range of development possibilities. A total of 41,692 hours of professional training were notched up in 2019, a personal win for all participants. With 235 internships and 49 apprenticeships, the Group also sets an example in the promotion of young people.

**41,692**  
hours of further training



Green energy

## RENEWABLE ENERGY

LEITWIND wind turbines have generated 820,000,000 kWh of green energy, roughly equating to the electricity consumed by 164,000 four-person households each year. The DirectDrive is especially suited to the production of renewable energy thanks to its low operating costs and high levels of efficiency.

**820,000,000 kWh**  
green energy



Interns

### FUNDING COMMUNITY

Traditionally, donating funds and sponsoring projects have been very important to us. Our Group dedicates itself to social issues and environmental protection around the world, supports social projects at all of its locations, promotes non-profit organizations and brings to life cultural and sports projects.

**€1,236,660**  
of donations in 2019

### KIDS DAY 2019 IN VIPITENO

For the ninth time, children had free rein over the production site at the headquarters in Vipiteno. The sun shone down on Kids Day, a festival for employees that takes place every two years and proves to be a source of much fun for children and adults alike. This event's 630 guests included 300 children, who had the chance to marvel at the ropeways and snow groomers from close up.



Raising awareness of disabilities and promoting integration



Kids Day 2019

### POMA COPORATE FOUNDATION

In December 2019, POMA established a corporate foundation to pursue social projects over the long term. The preparations, undertaken in cooperation with a team of dedicated employees of POMA, COMAG, SIGMA, SACMI, SEMER, lasted several months. The purpose of the Foundation is to support projects of general interest in connection with mobility and will focus on Sport, Environmental and Solidarity topics. The foundation is intended to play an active role in areas where POMA operates, thus contributing to the cohesion of the local communities. 100 working days are invested into this cause this year. By participating in projects, employees can demonstrate their team spirit and solidarity. This breathes life into the company's values and shows others what they are all about.

### RAISING AWARENESS OF DISABILITIES AND PROMOTING INTEGRATION

POMA's activities to raise awareness of people with and without disabilities show how important integration is to our Group. Accepting others, including at the workplace, is a matter of course for us. In cooperation with a charity, employees presented their work and tasks to unemployed people with disabilities and gave their suggestions for finding work. Furthermore, a roundtable was held with disabled athletes, including a Paralympic gold medal winner from the Olympic Winter Games in Pyeongchang, showing just what can be achieved even with a disability. POMA also works together with regional companies on common solutions to promote integration in personnel policy.

# Worldwide production and administration locations



Telfs / Austria



Grenoble / France



Gilly-sur-Isère / France



Montmélan / France



Passy / France



Veyrins / France



Herdwangen / Germany



Granby / Canada



Grand Junction / USA



Vipiteno / Italy



Vipiteno / Italy



Vipiteno / Italy



Selva Gardena / Italy



Turin / Italy



Stará L'ubovňa / Slovakia



Beijing / China



Chennai / India



Salt Lake City / USA





