

Roto Inside

Issue no. 46

Roto Window and Door Technology customer and partner information



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Website relaunch: informed at all times, anywhere

Constant focus on user requirements



State of the art: the responsive web design adapts the content of the website to the device being used.

■ **New at Roto** A comprehensive website relaunch dedicated to Roto Fenster- und Türtechnologie (FTT) is the next logical step on the road to effective digital support for customers and market partners all over the world. The range of products and services is displayed in a user-optimised format. Technical and promotional documents can be downloaded from a new download platform.

Stefan Barth, as the person responsible for the FTT website at Roto, worked together with colleagues from different areas for months with the aim of providing all of Roto's customers and partners with the best possible support for their work. He is happy with the outcome of the project: "Simple navigation, clearly presented content that is always up-to-date, the intelligent product finder and the convenient search function allow information to be retrieved quickly and create an enjoyable user experience. And it goes without saying that all Roto services are incorporated."

Welcome to Roto!

All users can continue to access Roto via the homepage [roto-frank.com](https://ftt.roto-frank.com) like usual. A digital "journey" through the world of Roto Fenster- und Türtechnologie is possible in German and English at the moment, with other languages to be added gradually.

Intelligent search function

The completely new product finder is set up as an "intelligent" filter which searches

through the entire stored product range in matter of seconds. This is how every visitor can find the ideal product solution in just a few clicks, despite the huge variety of products and the great wealth of information available on the website.

New download platform

The new Roto media portal can be accessed via the "Downloads" link in the "Service" main menu item. This is where all media is available, such as catalogues, installation instructions, brochures and interactive installation videos. An intelligent filter helps search for the relevant document here too. All you need to do is enter the product name to view a list of all stored media. Simply choose the media you require and download it in a package to save time.

The shortcut to a complete service

Optimising processes in window production, qualifying the in-house team for a seamless start to production, finding and ordering spare parts or simply just configuring hardware – for years, Roto has been offering valuable services and digital tools which many customers will no longer do without.

They are all integrated into the relaunch, obviously alongside the Roto Con Orders online hardware configurator. Roto customers sign in with their details in the login area and can access this proven tool like usual. In another login area, suppliers can download individual contractual and work documents, such as Roto company standards.

This is how good it gets with Roto

The "Company" menu item expands to a filterable reference database recommended to anyone who is seeking out new product designs and solutions. Around the world, window and door manufacturers play a role in creating superior, comfortable buildings with their products and Roto hardware technology. Examples of use from all over the world demonstrate which hardware and components they use to implement special solutions. They were integrated into the German website first.

In some of these reference reports, window and door manufacturers also outline their experiences with Roto hardware technology. In other reports, manufacturers describe the process of switching over to a particular hardware system or the benefit they obtained from various services such as Roto Lean consultancy and the Roto Campus, the international academy for advanced training for window and door technology.

Up to date and individual

The technical aspects of the website were implemented with the high-performance TYPO3 content management system. This system offers the option of advanced customisation of page content according to topic with the same design. This makes it possible to adapt the country-specific content of the local websites to the needs of the regional markets so that it is up to date at all times – for optimal benefits for users around the world.

Subsidiary divisions linked

Fenster- und Türtechnologie (Window and Door Technology) is one out of a total of three independent divisions of Roto Frank Holding AG. In 1935, Wilhelm Frank laid the foundation for the Roto Group's current product range with the establishment of the company and his invention of the first Tilt&Turn hardware and the loft ladder. The hardware technology from FTT is also connected to Roto Dachfenster (roof window) and is likewise part of the product range offered by the Professional Service Division. The divisions are listed together accordingly on the home page roto-frank.com and the individual websites branch off from there.

The product or service area of the new FTT website links to roof windows from Roto Frank Dachsystem-Technologie GmbH (DST, Roof System Technology) and services from Roto Frank Professional Service GmbH (RPS).

The new features at a glance:

- Website address: <https://ftt.roto-frank.com>
- "Intelligent" product finder
- Improved search function
- "Roto media portal" download area
- Filterable reference pages
- Design: clearly structured, user-friendly, intuitive
- Optimised for mobile use: perfect for smartphones and tablets

In conversation



| An interview with Marcus Sander, Chairman of the Board of Directors at Roto Frank Fenster- und Türtechnologie GmbH

Roto Inside: Mr Sander, this year will come to an end in a few days' time. What conclusions can you draw for Roto Fenster- und Türtechnologie?

Marcus Sander: It was a difficult year that presented unprecedented challenges for us all due to the coronavirus pandemic. At the same time, however, at the present moment I am also very relieved about how well we and our customers around the world managed to overcome this challenge over recent months.

Roto Inside: That sounds good. What are the reasons behind this accomplishment?

Marcus Sander: When the coronavirus pandemic broke out back at the start of the year, we shifted our focus towards two tasks. Firstly, being able to supply our customers all over the globe at any time. Our supply chains are on a firm footing around the world. Of course, we didn't just start working on that this year. But what is different is that, especially over the past few months, we have been producing more than the planned quantities in some cases, so that we were able to ensure that all product groups were and still are available in all markets at all times.

Our constant ability to supply is certainly an important factor in the stability of our customers. In any case, the construction industry has been impacted less than other industries on average around the world, meaning that window and door manufacturers were able to hold out this year. However, the situation is difficult for manufacturers in regions where local lockdowns have had a negative impact on the economy and where construction activity is dependent on tourism.

The second focal point this year was ensuring that our staff around the world stayed healthy and safe and therefore that we as a company remained able to take action. As the coronavirus pandemic progressed, we learned more about how to deal with it. Nowadays, face masks, a high standard of hygiene, social distancing rules and contactless temperature measurements have become part of everyday life at all pro-

duction sites. The result is that, to date, none of the around 3700 FTT employees around the world have been infected with the coronavirus at the workplace.

Roto Inside: Many companies in the metalworking industry had to accept a downturn in sales. What is your balance sheet looking like this year?

Marcus Sander: In the end, in 2020 we experienced a market that was, on the whole, stable around the world compared to other industries. We have, however, had to cope with huge fluctuations in demand depending on the region and over the course of the year. The company result of Roto Fenster- und Türtechnologie in 2020 is at the level of the previous year.

Conscientious cost management, prudent commercial activities and the assignment of resources depending on changing situations have played a role here. Investment in acquisitions and product development over recent years has paved the way for company growth. We were able to continue to benefit from these activities this year. This is supplemented by flat organisational structures and effectively interconnected processes at all sites. This is how we work efficiently and save costs.

Roto Inside: How do your customers benefit from the very robust company result achieved by Roto Fenster- und Türtechnologie?

Marcus Sander: We carefully invest in initiatives which benefit customers and prioritise accordingly. For example, we are forging ahead with digital projects much more intensively than we planned to at the start of 2020. This includes a multisensory sales tool. This tool provides a virtual forum where manufacturers and architects can discuss their ideas with experts from our Aluvision division. In this way, we are creating a customer experience which will go some way towards redefining our sales. Other examples are our web-based e-learning and also our recently relaunched website.

Roto Inside: Could you give us an outlook of the company's plans and objectives for the year to come?

Marcus Sander: We would like to continue to grow profitably. In other words, we are pressing ahead with further international market penetration by continuing our product policies from previous years. Our industrial systems expertise is a pillar of our central strategic approach. With regard to this aspect, the benefit gained from combining hardware and gasket products is also evident. I'm referring to our affiliate Deventer here.

Roto Inside: Industrial systems expertise, that sounds very theoretical...?

Marcus Sander: For us it means innovative products with the technological backbone of a modular system, highly available with short delivery times, paired with dedicated technical support and high product reliability. The technological backbone is formed by our Roto NX Tilt&Turn modular system. Specific enough to implement many window functions with just a few parts, but also broad enough to cover unusual applications.

Roto Inside: What specific benefits do your customers get from your systems expertise?

Marcus Sander: Since Roto NX components can also be used to produce individual sliding solutions, the individual hardware systems are highly compatible and ensure economical manufacture in all window production processes. And there's more: the modular concept gives our customers freedom to turn their ideas into reality with a manageable number of items. In this way, we fulfil another aspect of our strategy, specifically our absolute focus on customers. In a similar vein, we also divert our profits into investment which further increases the benefits for the customers. To put it in concrete terms, we are planning further product innovations for 2021.

Roto Inside: You mentioned product innovations... would you like to let us in on any secrets?

Marcus Sander: I can't actually give you any product names or market launch dates yet. All I can tell you is that there will be a lot going on with our Sliding and Door opening types in 2021.

And I'm really looking forward to working with our customers over the next year to communicate many subjects to the target group of end consumers. As no matter how much the situation with the coronavirus pandemic might continue to challenge us, when it comes to products, for many years now we have been able to offer the very responses that are needed right now. For example, our TiltSafe tilt ventilation secured in accordance with RC 2 or sliding solutions like Roto Patio Inowa and Alversa come to mind here. With these products, our customers around the world have excellent options and benefit from the support of Roto FTT to fulfil user requirements as successfully as possible.

I would like to take this opportunity to thank all of our customers, market partners and staff for everything we have accomplished together this year. Stay healthy and take care. I wish you and your families a peaceful Christmas, restful days at the turn of the year, and a positive start to the new year.

Roto at BAU 2021: digital and innovative

Aluminium experts in a virtual dialogue

■ **Aluvision** Architects and metal constructors from all over the world appreciate the special combination of product innovations and tailored advice from Roto at trade fairs like BAU in Munich. In January 2021, the experts from Roto Aluvision will surprise their customers with an innovative digital alternative.

Even though Roto will not be attending next year's BAU event, prospective customers are still able to talk to the aluminium experts from Roto. A digital forum where manufacturers and architects can discuss their ideas with experts from Roto Aluvision provides the ideal platform for this.

Individual and inspiring

For the digital trade fair meeting, the aluminium experts are planning to showcase products, including new launches, entirely according to the needs and requests of the prospective customer. This showcase forms the basis for project-specific consultation. This virtual "trade fair meeting" may cover new product concepts, presented in detail, examples of use from all over the world, interviews with experts and insights into the global world of Roto.

Jordi Nadal, Managing Director of Roto Aluvision, summarises the idea behind this new service as follows: "Customers tell us



when, how long and about what topic they would like to talk to us and we put together a tailored combination of material that may be of interest to them." In doing so, Roto will use the full potential of digital meeting technology.

Flexible and almost limitless

A special opportunity: in addition to the innovations and product solutions that would have been on show at BAU, additional examples of use or hardware components can also be integrated into the imagery and sound at any time. "It goes without saying that we would like to talk about our new launches for 2021," explains Nadal, "but before the meeting we will be asking the

participants about their wishes in detail. This gives us the opportunity to individually combine information about our new launches with details of further product solutions and background information that could be relevant to them." Nadal is certain that "from January, Roto will offer a unique kind of experience to all those who produce aluminium windows and doors."

Prospective customers are now able to contact their Roto sales adviser. They will schedule a date for the virtual trade fair meeting, compile exciting topics based on the customer's concerns and respond with details for accessing the digital meeting room.

Fully concealed hinge side with Roto NX



Roto Designo ensures maximum stability for sash weights of up to 150 kg thanks to the robust load transfer – in conjunction with the Roto Eifel TB threshold here. The turn restrictor takes the load off the end stop integrated in the pivot rest and prevents the hardware being damaged in the event of sudden loading, e.g. due to a gust of wind.

Tilt&Turn In all frame materials, the Roto Designo concealed hinge side with components from the Roto NX modular system with separate load transfer can support sash weights of up to 150 kg. And all this even with the smallest frame clearances on Turn-Only and Tilt&Turn windows and doors.

With the launch of Roto Designo in the Roto NT hardware system, Roto took on a pioneering role in 2006 and was at that time one of the first providers of a fully concealed hardware system: all components disappear completely into the window rebate. From then on, there have no longer been any limits for profile views with a sophisticated appearance thanks to the concealed hardware technology.

The “concealed one” among Roto’s hinge sides has been constantly further developed over the last 14 years. Nowadays the design engineers have a correspondingly broad range of experience on this topic and the expectations of users of Roto NX are met accordingly – the Roto Tilt&Turn hardware generation shaping the industry once again.

Simply make the change!

The combination of Roto Designo with Roto NX components is good news for all of Roto’s part-

ners. This is because window manufacturers who already produce concealed solutions and also already use Roto NX can continue their work without any conversion processes.

Manufacturers who still use surface-mounted hinge sides can also choose to switch to the Roto Designo concealed hinge side at any time without the need for any conversion work in production.

Largest possible areas of natural light

Thermal insulation and sound insulation are among the standard requirements that are implemented using multiple glazing. Sash weights of above 100 kg are not rare. This is where Designo fully plays to its strengths of the load transfer of up to 150 kg: the sash rebate width of 1400 mm that is possible with the hinge side and the sash rebate height of up to 2600 mm allow for the largest possible areas of daylight in all frame materials despite multiple glazing.

Depending on the hardware axis, a Designo element can be opened up to an angle of between 96° and 100° and offers an unimpeded view thanks to this particularly generous opening width.

Uninterrupted window production

In accordance with Roto’s system logic and platform strategy, the hinge side components of the Designo are perfectly tailored to the Roto Tilt&Turn modular system. This considerably reduces the installation effort and even makes automated sash hardware installation possible.

Regardless of the hinge side chosen, window production can carry on without the need to take breaks to change tools. This is because the variety of individual parts used has been kept to a minimum. Small batch sizes can also be flexibly produced.

Simple installation

The convenient 3D adjustment options in the stay arm, corner hinge and pivot rest mean that Designo window sashes can be mounted in just a few steps – completely easy to install and safe. And there’s more: the load transfer, which is invisible from the outside, can be installed with simple standard tools, even at a later point.

Including all Tilt&Turn functions

All known functional features of Tilt&Turn hardware, such as tilt distance restriction, an anti-slam device and a turn restrictor, are integrated into the combination of Roto Designo with Roto NX components.

Lifting mishandling device

The Roto NX lifting mishandling device always lets the sash run into the frame at the same level on the Designo too, and prevents the window from sagging on the handle side. It also rules out incorrect operation of the window.



Lifting mishandling device sash component

Lifting mishandling device frame component

The robust spring mechanism of the lifting mishandling device results in especially reliable and durable windows and balcony doors. The spring can be accessed through a slot in the arm of the sash component, meaning that the lifting mishandling device can be switched back to the left or right at any time after accidental erroneous switching. This eliminates the need for time-consuming removal of this functional component.

Balcony door bullet catch

By means of the robust spring structure, the Roto NX balcony door bullet catch also ensures low-maintenance reliability on Designo balcony doors. Its shaping results in ideal run-in characteristics and a high retaining force. The height adjustment of the sash component by 7 mm facilitates installation. The position of the frame and sash components can be perfectly matched.

V locking cam from the Roto NX system: its intentionally small amount of movement, flat guide and large contact area on the faceplate ensure the best possible stability, sealing and burglary inhibition.



V locking cam

The Roto Designo’s burglary inhibition in accordance with RC 2 is ensured by security components such as the anti-jimmy protection in the corner hinge and T striker-entry in the tilting mechanism.

The V locking cam from the Roto NX system is the functional component in this case too. It achieves stability designed for the best possible burglary inhibition through the intentionally small amount of cam movement, flat guide and large contact area on the faceplate. Height and gasket compression are adjusted at the same time. The precise height adjustment is controlled by the integrated fine-pitch thread.

The V locking cam enables faster installation of the window element on Roto Designo too, as it absorbs more rebate-clearance tolerances without any adjustments having to be made. The advantage: building elements can be installed quickly, even in challenging installation situations.

These time savings are also facilitated by the use of a standard commercial 4 mm hex key for window adjustment – a standard tool used by every window installer to adjust numerous other hardware components such as pivot rests or stay arms. The hex key is also used to adjust the P and E locking cams.

Tightly sealed and accessible

Balcony doors with fully concealed Roto Designo hardware technology can of course also be configured to be resistant to driving rain and conveniently low to the ground.

To achieve this, the Roto Eifel TB thermally broken threshold is combined with the Designo weather profile strip with integrated brush gasket. With its installation height of 20 mm, the threshold meets the requirements stipulated by DIN 18040 for accessible housing construction. Thanks to the installation packer for the pivot rest and turn restrictor on the Designo, the components mentioned can be installed without any hassle.



Bullet-catch sash component



Bullet-catch frame component



➤ **The Roto Designo fully concealed hinge side at a glance**

www.roto-frank.com/en/roto-designo

Fensterbau Lauber, Germany

This family-owned company means business



Since moving to its new production building, Fensterbau Lauber has been using the hinge side P from Roto NX.

In the photo to the left: Markus and Michael Lauber manage the company their parents founded in 1966. Three members of the third generation of entrepreneurs in the photo to the right: Vanessa, Yannick and Tobias Lauber (from left to right).



■ **PVC Roto NX – this is the hardware that’s making window production even more economical. It’s not just Roto who is saying that. Roto Inside heard from Markus and Michael Lauber, second-generation window manufacturers, about why switching to this hardware product range made sense for their company, especially this year.**

Step by step, stable funding, with a clear vision of the future of window production – this is how the Lauber family-owned business in Singen by Lake Constance transformed into a respected supplier of building elements in the south of Germany over the years. A new building for producing PVC windows was recently commissioned. It is located on an area of 27,000 square metres right next to the production facility for timber windows, which was opened eight years ago. In the medium term, the committed family of entrepreneurs is planning to additionally build a modern management building and showroom on the plot they acquired in 2012.

The rise of the third generation

The task of managing the company is now in the hands of Markus and Michael Lauber, the sons of founders Gregor and Gerda Lauber. They are actively supported by their wives Heike and Simone alongside three out of their five children. “This company is a joint effort for us,” explains Markus Lauber in an interview with Roto Inside, “and since we know that the next generation is committed to playing a role, we have given the green light to growth and investment.”

Two-thirds more sashes than at the old site have already been produced at the new PVC



The future of family-owned company Lauber is taking shape on 27,000 square metres in Singen by Lake Constance.

window production facility in just single-shift operation. “Right now, we are preparing for what we think is in store for us over the next 10 to 15 years,” explains Markus Lauber. “With our new high-bay warehouse, adhesive dispensing robot, modern machining centres and the shuttle system for delivering to workstations, we have taken one huge step into the future and towards becoming even more efficient. This is a step that many people would not have thought possible for a family-run company with just under 80 employees.”

Economical production with Roto NX

At the new site the go-ahead was given for Roto NX too in addition to PVC window production. “It had been clear to us for a long time that our next step should be to switch from Roto NT to Roto NX,” recalls Markus Lauber. Over 40 years ago, his father chose to collaborate with Roto in the Tilt&Turn

segment, and for his brother and him, there has never been any reason to change this choice of supplier.

“Roto impresses because it is the full package.”

It is not least the continuous dedication to updating its product range that makes the hardware manufacturer an attractive partner. “Roto brings us components and innovations at an early stage that we need to adapt to new trends in the market,” explains Michael Lauber. As a sales representative, he also directly advises homeowners making a purchase and has a good instinct for “what’s coming next”, underlines his brother Markus. Roto NX impressed them even from the market launch.

Attractive, even for heavy sashes

The Roto NX hinge side P impresses with its outstanding design and its high load bearing capacity without additional screw fixings up to 130 kg, explains Michael Lauber. The company also works with the new lever-operated espagnolette Plus on a regular basis. Markus Lauber praises more than anything the benefit the hardware product range offers in terms of the efficiency in production: “In our new



PVC window production facility, we greatly increased the degree of automation in comparison to the old site. Through this step and because Roto NX is now easier to install, we can still guarantee fast delivery, even if the sales volumes continue to grow constantly.” Fewer screws, fewer additional components with heavy weights – these may be small details, but they add up to a quantifiable time saving over the course of a day.

“Roto NX ensures added efficiency.”

Markus Lauber also considers the EasyMix system, in other words the separate delivery of faceplate and gearbox or lock casing, which are simply clipped into each other as required entirely without screws, to be an important further development of the Tilt&Turn modular hardware system. The system reduces the need for storage space and the outlay required in production logistics. “In any event, we have been so impressed by Roto NX that we will be switching to the hinge side T in timber window production as soon as possible. But you’ll be familiar with our motto: step by step. We are currently dealing with the last few minor start-up issues in the PVC production building.”

Ensuring consistent quality

So does the Lauber family believe in further growth? “We at least hope that, despite the coronavirus pandemic, there will be no drastic drop in demand,” explains experienced window manufacturer Michael Lauber. Meanwhile 60% of the items manufactured at both of Lauber’s production buildings are bought by building element dealers and large construction companies. And their order books remain



➤ **Economical, safe, convenient, design-oriented: Roto NX at a glance**

roto-nx.com/en



Sofos, Russia

Experiencing the diversity of Roto in a showroom



The workstations in PVC window production are supplied from the new high-bay warehouse with its 232 slots via an automatic shuttle system.

The new glazing robot removes insulating glass from the glass sorting system and insets it into the sashes.



■ **PVC|Aluminium** Russian window manufacturer Sofos produced more than 200,000 Tilt&Turn windows in 2019. Most of these were PVC. This year, the focus was on marketing new window models based on Roto NX. They impress with their added security and high level of operating convenience.

“In February, we opened a showroom with an area of 220 m² in a very sought-after shopping centre in Moscow. This was followed by another in Saint Petersburg in July,” reports Head of Marketing Anatoly Sorokin, “and in both of these we exhibit new Tilt&Turn windows with Roto NX in order to provide the best possible advice and support regarding the benefits and possibilities of this excellent new hardware.”

Individuality is the trump card

Sofos relies on collaboration with specialist retailers for whom the around 400 members of staff in the Moscow factory produce PVC and aluminium building elements of all required opening types. Sorokin, who has spent his entire career so far working at the company, underlines that “since the company was founded in 2001, our objective has been to manufacture products tailored to customers’ requirements, which is why we rely on a high degree of vertical integration in our own factory.”

Success with the right partners

Suppliers who flexibly support Sofos are important for the positioning in the middle and premium market segment. In this sense, Roto is a particularly important partner. Whether Roto NT or Roto NX, Roto Patio Alversa or Roto Patio Inowa – Sorokin appreciates the performance characteristics of these hardware product ranges and presents them to long-standing customers of Sofos.

“We demonstrate the full potential of Roto technology.”

The new showrooms are greatly important for this purpose. The marketing specialist is convinced that customer training sessions and meetings with architects simply need the right environment.

Consulting pays off

“Together with Roto, we have been providing training on the strengths and characteristics of Sofos Tilt&Turn and sliding elements for many years,” he reports. “I am sure that the time we take for this is a good investment.” The proof of this is that, even in 2020 during the coronavirus pandemic, the company managed to process attractive orders in the medium and premium price segment.

He personally suspects that the pandemic has caused people to seek out even greater comfort and security.

“Roto NX and Roto TiltFirst are now fully on-trend.”

In the opinion of Sorokin, this is also proof of people’s desire to live in an environment furnished to a high standard.

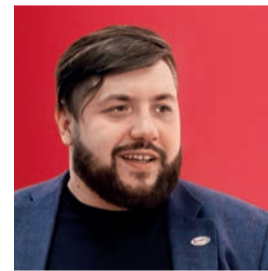
Sliding systems becoming increasingly popular

Moreover, the demand for large – and also more expensive – sliding systems is growing every year. He is convinced that “since we can develop and produce tightly sealed sliding windows and doors with Roto Patio Alversa and Roto Patio Inowa, Sofos is playing an important role in making this opening type ever more popular in Russia.” Especially in the cold and dark winter months, these space-saving systems prove their effectiveness thanks to outstanding sealing and therefore thermal insulation, while letting a lot of natural light into the home.

Shared mission

Next year, Sofos will celebrate its 20th anniversary and the team from Roto Russia will mark its equally long collaboration with the Moscow-based window manufacturer. “We can look back on a thoroughly good time, when friendly relationships and a solid foundation of trust developed,” states Viktor Melikhov, General Director of OOO Roto Frank Russia. “The shared commitment to training specialist retailers and providing information to architects and interior architects remains a mission which we are happy to fulfil together with Sofos.”

www.sofos.ru



Anatoly Sorokin,
Head of Marketing,
Sofos, Russia



Viktor Melikhov,
General Director of
OOO Roto Frank
Russia

On show in the Moscow showroom: Roto NX, Roto Patio Inowa, Roto Patio Alversa, Roto AL (focus on Tilt&Turn)

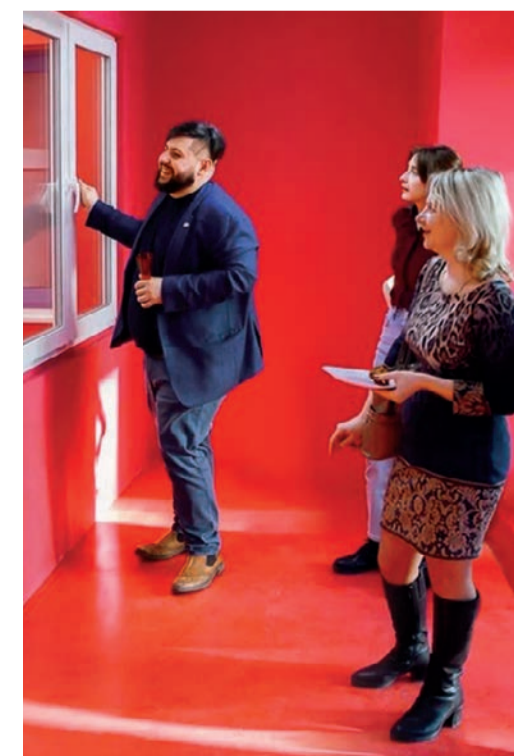
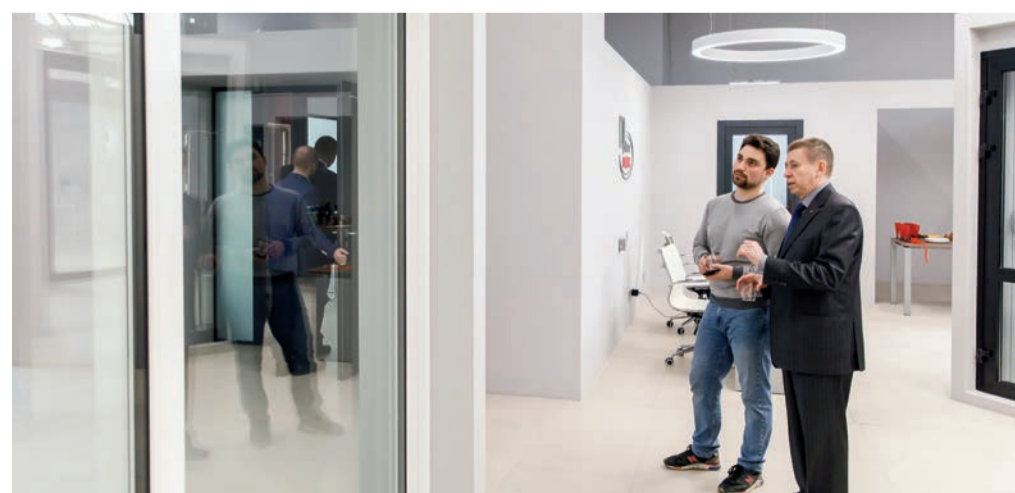
fairly full right now. “We collaborate with very successful companies that build residential properties here in the region. And we focus on giving them exactly what they are looking for: modern windows of a consistently high quality.”

Embodying values

The basis for the consistently high level of quality is formed by the family’s values, which they embody together with their staff. “Reliability, consistency and openness – we don’t distinguish between customers, suppliers and employees; we always treat others as we would like to be treated. This has resulted in us having a very stable team including many employees who have been with us for a number of years. This team actively works on achieving the good quality that is typical of Lauber at every stage of production – day in, day out.”

Because the company is loyal to its suppliers and reliably honours its promises to its customers, Lauber Fensterbau receives a lot of strong support from the industry and usually fair treatment in the market. The optimism of the family of entrepreneurs is therefore on a firm footing: “We want to continue to grow robustly because we rely on sound relationships along the entire value chain. Lauber was and always is at the forefront when new developments are requested on the market or when innovations from good partners like Roto unlock new possibilities. Our family ranks among those that deliberately and decisively does everything necessary and leaves no stone unturned when it comes to achieving long-term success.”

www.fensterbau-lauber.de



Petecki, Poland

Remaining premium

■ **PVC|Aluminium** Polish window manufacturer Petecki has relied on Roto hardware technology for 25 years. With the latest innovations, it is planning to further expand its position in the premium segment.

More than 1000 members of staff now work at the four factory sites run by the company, which was founded in 1995, in Łódź, Łask, Gostynin and Chrapczew. Roto NX or Roto NT Designo hardware is found in the more than half a million Tilt&Turn windows that the company produces from PVC alone in a year. Tightly sealed sliding elements with the Roto Patio Inowa hardware have formed part of Petecki's product range since 2020. "With these three excellent hardware product ranges, we will meet our customers' increasing requirements," believes company founder Ignacy Petecki, "and when it comes to matters like RC 2 security on Tilt&Turn windows, even when the window sash is tilted, or an RC 2-compatible sliding system like Roto Patio Inowa, we have an advantage over many competitors."

On trend: sliding doors and windows

The experienced window producer considers sliding elements and doors to be a future product trend. The new generation of hardware from Roto plays a major role in this. With Roto Patio Inowa, for instance, it is possible to work with very sleek profiles and produce tightly sealed and extremely user-friendly sliding elements. "This is why we will soon focus our efforts on introducing this hardware into our aluminium window production, too."



| The Inowa Slide System from Petecki. Photo: Petecki



| Petecki believes it is ideally equipped for the premium segment with Roto NX.



| Modern window production in Łask.



| A lot of room for good advice in the showroom in Łódź. Photo: Petecki

In demand: hardware for high weights

The businessman hopes that innovative technology, modern design, ease of use, functional safety and durability will continue to set products from Petecki apart. However, the constantly increasing sash weights pose a particular challenge. "Heavy sashes with triple glazing are the rule, no longer the exception, in our markets these days," he explains. "The high load bearing capacity of the Roto NX hinge side P of 130 g even in the standard version helps us hugely here. The night ventilation integrated in the stay arm or stay guide as standard and the improved taper action are equally crucial to the premium quality of our windows."

Future-oriented: investment in automation

The businessman is currently investing in the automation of many areas of production. He is convinced that "by increasing our use of robots and machining centres, we will reduce the throughput times for orders while ensuring quality." He appreciates that, with Roto, he has the support of an expert contact, including when introducing new production processes. The partnership with Roto has become ever closer over the years and now includes various aspects relating to marketing and production management.

"We really appreciate Roto's expertise in production and sales."

The issue of how to proactively meet the customer requirements of tomorrow, today is significant to both companies. "The Petecki brand is regarded as a premium brand in Poland. To maintain this positioning, we need partners and suppliers that offer premium-class products and services themselves," emphasises Petecki. "Roto is definitely this kind of partner."

International: branding with Roto

Strengthening his brand abroad is also important to the businessman: "We now produce for building element dealers in Germany, Belgium, France, Italy, the Netherlands, Sweden, Switzerland, Slovakia and the Czech Republic. We see this as a unique opportunity for further growth." Petecki explains that Roto is familiar with each of these markets

and can offer a good service and the necessary support in each one.

"Around the world Roto, like us, counts on reliability and precision."

This helps and encourages window professionals to implement their ambitious growth plans in the knowledge they have "the right, reliable partner by our side".



▶ Video of the new V locking cam

<https://www.youtube.com/watch?v=1UiEgA6X0OY>



| Ignacy Petecki, Company Founder

Roto Patio Inowa in RC 2 and SKG**

Certified security with a delicate design

■ **Sliding** Intelligent, tightly sealed sliding systems with the Roto Patio Inowa hardware are in demand. After all, with their usually sleek profile views they cater to the global trend for large glass surfaces for maximum transparency. And they are reliable and secure! Successful RC 2 tests with sliding systems made of PVC, timber and aluminium are the best proof of this.

Renowned PVC profile manufacturers and large aluminium and timber window manufacturers have developed customised configurations of Roto Patio Inowa together with Roto. Window manufacturers all over the world benefit from close collaboration between their system provider and Roto.

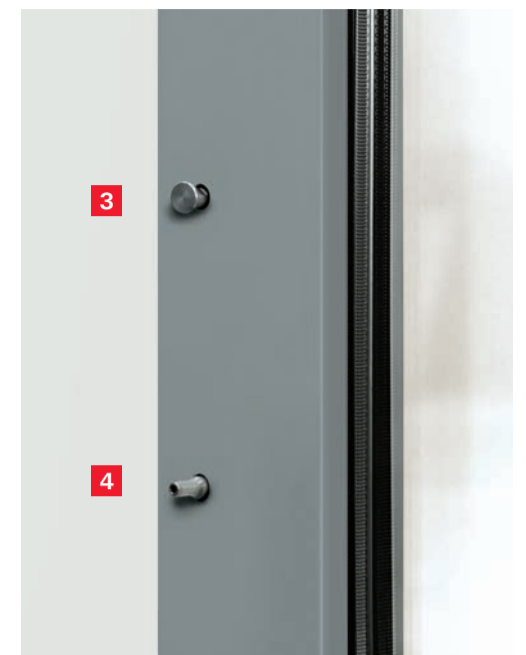
Resistance all down the line

Part of any configuration of Roto Patio Inowa is Roto's standard security components like the V locking cam from the Roto NX and Roto AL Tilt&Turn hardware systems. It hooks securely into a security striker, effectively preventing jemmying of the sliding sash.

A lockable handle with 100 Nm torsional resistance prevents the hardware from being moved or unlocked from the outside. Drilling protection, which is invisible from the outside and is installed in the groove, prevents the espagnolette from being drilled out.

Security strikers have been developed specially for the mullion of Roto Patio Inowa, which alongside the security locking cams each form an active locking point there. The additional feature of these mullion security strikers is an integrated hardened steel plate.

- 1 Mullion security striker with cover cap
- 2 Striker for anti-pushback function with cover cap. The requirement for RC 2 on Roto Patio Inowa is two anti-pushback functions.
- 3 Mullion security locking cam
- 4 Pin for anti-pushback function



Fewer components – improved appearance

The sash of a Roto Patio Inowa sliding system is moved into the closed position effortlessly via the roller units and control units in a process controlled purely by the handle. In the access area, in other words horizontally at the top or bottom of the frame, no further locking components are required either for gasket compression or for security – a clear advantage for the design. This means that no frame components protrude into the opening in the area of the threshold. At the same time, installation is more efficient since there is no longer any need to install components in the horizontal frame level.

The requested gasket compression, which is required in order for systems to be tightly sealed, is ensured in the Roto Patio Inowa sliding system by just the functional combination of the horizontal lateral rollers with the guide track above it and roller track below it. In the closed position, the rollers are supported against the tracks.

Anti-pushback function for RC 2

To achieve burglary inhibition in accordance with security class RC 2, an anti-pushback function is also used vertically at the top and bottom of the mullion area. This security feature supplements the mullion security strikers as an additional active locking point and also consists of two parts: the "pin for anti-pushback function" is installed on the sash. It is released when the handle is operated and extends into the "striker for anti-pushback function" fitted to the frame. This means that, in the event of an attempted burglary, the element is secured against both lateral movement and jemmying. For a system to be RC 2-compatible, two anti-pushback functions must be installed.

The mullion security strikers, which are visible when the sash is open, and the two "strikers for anti-pushback function" can be concealed with a cover cap.

Tightly sealed, burglar inhibiting and delicate

System providers aluplast and Gealan decided to use Roto Patio Inowa in their own sliding systems immediately after it was

launched on the market. They followed the development of compatible security components at Roto with interest, both with regard to the burglary inhibition and the attractive design.

In October 2019, the Smart-Slide sliding system from aluplast passed the tests for resistance class RC 2 in accordance with DIN EN 1627. Carsten M. Schäfer, Sales Operation Manager at aluplast GmbH, emphasises this achievement as follows: "This means that this sliding system for large formats not only has especially good values for thermal insulation, statics and tight sealing, but can also impress with increased mechanical burglary inhibition."

In August 2019, the Smoovio system passed the tests for resistance class RC 2 in accordance with DIN EN 1627 without any difficulty, reports Andreas Linke, Group Manager for Product Management at Gealan. He particularly likes the security strikers for the mullion: "It has been proven that they are incredibly effective as a mechanical lock. And the fact that the colour of the cover caps can be tailored to the profile colour enhances the good design."

Further tests in the pipeline

Thanks to the sophisticated security concept of Roto Patio Inowa, aluminium sliding systems also passed the relevant RC 2 tests, such as those systems from Schüco, Ponzio and Feal. Tests with further profile systems are in the pipeline. Unanimous feedback: Roto Patio Inowa helps produce sliding systems which successfully withstand burglary attempts without having to make any compromises on the product design in exchange for added security.

SKG**

Roto Patio Inowa vastly improves mechanical burglary protection in the building envelope in accordance with the SKG requirements as well. With Roto Patio Inowa, window manufacturers from Belgium, the Netherlands and Luxembourg can produce safe sliding elements based on the regional safety standard SKG**. Corresponding SKG** certificates are available.



No frame components protrude into the opening on Roto Patio Inowa. The sliding sash is moved to the closed position directly via the roller units and control units.



➤ For more information about the intelligent hardware with concealed technology for tightly sealed sliding doors

www.roto-frank.com/en/roto-patio-inowa/



Carsten M. Schäfer,
Sales Operation
Manager at
aluplast GmbH



Andreas Linke,
Group Manager for
Product Management
at Gealan Fenster-
Systeme GmbH

Meffert Aluminios S.L., Spain

Starting over with Roto

■ **PVC** Delivering high-quality windows and doors to the owners of detached houses can bring a lot of joy. Basic requirement: the profile, glass and hardware must fulfil the performance promises made to the customer. Meffert Aluminios found the Roto Patio Alversa universal hardware for parallel sliding and Tilt&Slide doors to be a guarantee of quality.

In 2006, José Ángel Torres Salvador and José Ángel Rodríguez Gómez, who were both 28 years old at the time, first founded a metal construction company in the Andalusian capital of Almería, where they produced windows for the region's construction companies. They began producing PVC windows and doors in 2015. "We took the economic crisis that was affecting Spain at that time as an opportunity to turn towards a new market segment: replacing windows and doors in premium detached houses." They searched for the ideal solution together with their profile supplier Kömmerling.

The solution to their problems:

Roto Patio Alversa

Collaboration with Roto began in 2017. This collaboration dispelled many of the concerns experienced by the two entrepreneurs. The hardware that was previously used in sliding systems was the reason behind many customer service assignments. "In principle, sliding systems offer a host of advantages but they often used to be very prone to faults, unfortunately," recalls José Ángel Torres Salvador. "Our fitters were constantly having to repair jammed sashes for customers." The launch of the hardware from Roto put an end to this, which encouraged him and his team to increase their efforts in the sliding market segment again.

"We saw our opportunity to start over again."

Quadrupled sales

In 2019 alone, Meffert Aluminios equipped around 50 sliding systems with Roto Patio Alversa. The businessman reports that he set up an exhibit in the showroom to promote the system. Once customers have experienced the user-friendliness of this system for themselves during the consultation, the decision will usually be a foregone conclusion. "This sliding system is simply superior to those that people were familiar with in the past, and this is something that people also notice for themselves."

Quiet operation

The hardware's special opening and locking mechanism enables particularly smooth, quiet operation. Damping elements enable the sash to run in and out smoothly. In the opinion of the advisers from Meffert, these are remarkable strengths. "The two Parallel Sliding variants can also be operated intuitively, in the same way as conventional Tilt&Turn windows. Builders also appreciate this, as it means that even children can use the sliding door more easily and safely."

High level of operating convenience

Customers searching for a particularly high level of comfort often choose the Roto Patio Alversa | PS Air Com version in the Meffert showroom: turning the handle tilts the sash automatically; there is no need to use force to pull the sash manually. With this, even large and heavy sliding doors with a weight of up to 200 kg can be operated effortlessly.

"Nowadays, we sell sliding solutions with a width of up to 2000 mm and a height of up to 2700 mm. With dimensions like these, a sash weight of 200 kg is soon reached." The load-bearing capacity of Roto Patio Alversa therefore plays an important role. The night ventilation, which is optionally available with Roto Patio Alversa | PS and cannot be seen from outside, is now more frequently requested.

The spring-mounted tilt assistance element in Roto Patio Alversa | PS Air Com is integrated into the sliding scissor stay. It reduces the torque at the handle lever when the sash is tilted in a process controlled by hardware.



➤ **Comprehensive information on the Alversa Parallel Sliding and Tilt&Slide system**

www.roto-frank.com/en/roto-patio-alversa

Robust and easy to install

In the opinion of fitters in Meffert's production, the "german made" hardware also impresses for completely different reasons. The roller units, just like all of the other hardware components, are of high quality and robust, which is noticeable even during the early stage of processing.

"The quality and ease of installation impress our team."

The working time is reduced by this, for example because the "bogie safety mechanism" component is no longer required, as this function is already integrated into the bogies' housing. The bogie safety mechanism therefore does not have to be activated and operation steps

can be omitted during installation. Another advantage of Roto Patio Alversa in the businessman's opinion is that "the storage requirements are low because many of the same parts are used for the total of four different versions of the system."

Reduced effort

Intelligently combining components from the Roto NX modular system with specific Alversa components, such as a roller unit, sliding scissor stay or track set, ensures that a high proportion of common parts can be used across all variants. This reduces the outlay required in storage. "Just one example: for all versions we use the central locking system that we as a fabricator of Roto NX have in stock anyway." So business with sliding systems is still attractive? "Attractive and reliable. At least if you're working with Roto." www.meffert.es

José Ángel Torres Salvador (on the right in the photo) founded the window building company Meffert Aluminios together with José Ángel Rodríguez Gómez. In the showroom he is assisted by Lucía Álamo Hernández (on the left in the photo) and Carmen Fenoy Nieto.

Roto Patio Alversa in the Meffert showroom





| Sliding systems from Weather Shield for greater comfort and thermal insulation

Weather Shield, USA

“Innovation is our mission”

■ **Timber** “Innovation is an intrinsic part of the Weather Shield DNA,” says Marketing Director Chris Schield. He is a member of the third generation of the family that founded a production site for timber building elements in 1955. To date, the company remains based in Medford, Wisconsin, and has been a close partner to Fasco and Roto for a number of years.

Testament to the extraordinarily trusting collaboration between the two companies are their “innovation workshops”, in which the two partners put all their cards on the table, so to speak. Both companies have continuously benefited from this open exchange. For example, the Sliding Patio Door from the Contemporary Collection turned out to be a real winning hand for both parties.

Recognised for best design

The sliding system’s widely anticipated market launch took place in the USA and Canada in 2019. Last year, a jury of designers and architects presented it with the “Record Product Award”. The leading magazine for design and architecture in America awards this prize to products in eight categories that have impressed them with their quality design and functionality. Above all, it was the Weather Shield product developers who were honoured – but some recognition is also due to Roto for their work on developing the Patio Inowa hardware, says Schield.

“Being part of a team with Roto doesn’t make us good – it makes us better.”

With its innovative closing movement, this hardware is perfectly adapted for very narrow Weather Shield design profiles. “This is what makes it possible for us to manufacture tightly sealed sliding systems in accordance with resistance class RC 2 on a large scale and using all key diagrams,” explains Schield.

Smart, smarter, smartest

Since the award ceremony, however, these manufacturers have not been resting on their laurels. When technologically and aesthetically leading products such as the Sliding Patio Door are positioned on the market successfully, it is generally agreed that it pays off to maintain the lead over the competition and to stretch this advantage. Despite its success, the new sliding system remained on the agenda for the joint workshops. After all:

“This is the meeting place for people who never run out of ideas.”

Schield happily recalls exchanging ideas with Roto over the past year, saying “We jointly considered whether we could use innovative ideas of comfort to further develop and promote the Roto Patio Inowa sliding system with its unique closing movement and excellent sealing.” The results of this collaborative thinking have since acquired names: SoftClose, SoftOpen and SoftStop.

Soft comfort

The key component is a gas spring made of steel. It is tensioned when the sash is opened (SoftOpen) or closed (SoftClose), storing energy for subsequent automatic movement of the sash. The SoftClose function of the Roto Patio Inowa causes the sliding sash to be gently braked, automatically pulled shut and closed. The SoftOpen function briefly brakes the sash after opening and then pulls it automatically into the open final position.

From January 2021, Weather Shield will sell sliding systems with Roto Patio Inowa that come with one of these two comfort functions as standard. The company has thereby become one of the first users of these functions worldwide. Schield is convinced:

“With this, we are setting new benchmarks for operating convenience.”

Due to growing interest in very large sliding sashes and maximum transparency in the USA and Canada, the third version of the gas-spring-based function will also be used with Weather Shield in the future. “Whenever customers want large systems with very wide, heavy sashes, we will use Roto Patio Inowa with the SoftStop function, as this allows the sashes to be closed more easily.” In this version, the intelligent sliding hardware can be used even with sash weights of more than 200 kg.

High-tech handiwork

“At Weather Shield, we combine handicraft and engineering skills in order to develop the highest quality windows and doors. Our building elements help architects, construction companies and homeowners to push the boundaries of what is possible. Not a day goes by without us working to make our products even better.”

When doing so, the environmental responsibility of the company and its customers is always at the forefront. Tightly sealed building elements such as the Sliding Patio Door make a significant contribution to reducing the demand for energy arising from use of the building; this issue is very close to the Weather Shield developers’ hearts. “Through the innovative use of materials and the design of our products, we play a part in ensuring that our current range includes many stylish models that bear the Energy Star® label. In this respect, too, hardware from Roto plays a key role.” www.weathershield.com



| Chris Schield, Marketing Director, Weather Shield Mfg, Inc., Wisconsin

| As standard for sashes weighing over 200 kg in the Sliding Patio Door from Weather Shield:



➤ For more information about the intelligent hardware with concealed technology for tightly sealed sliding doors

www.roto-frank.com/en/roto-patio-inowa/

Versco, Versbach Metallbau, Germany

Concealed hardware for a modern main door design



| The Roto Solid C concealed door hinge in black

| Harald Bremer, Managing Director and Chief Partner of Versco, and Lutz Fehring, Managing Director of Marketing and Sales (from right to left)

■ **Door** “The Roto Solid C door hinge and the collaboration between Roto, the profile supplier Wicona and us, which was excellent right from the start, is simply good fun,” states Lutz Fehring, Managing Director of Marketing and Sales at Versbach Metallbau GmbH in Walldorf, Thuringia. He has worked at the company for over 20 years.

In its new general catalogue for the Quattro Elementi main door series, Versco presents its joy of collaboration and technology. The Roto Solid C concealed door hinge in this catalogue is also one of the topics that underlines how the main door specialist feels responsible for outstanding quality down to the detail.

Technology designed to excite

The hardware options for the hinge side and locking side are illustrated in the catalogue in a way that is easy to understand for laypeople. This is because the experienced building element manufacturer is certain that private customers – in his experience usually women – want to be well informed about topics such as these.

“You’re mistaken if you think that women aren’t interested in technology!”

This year saw the launch of Versco Edizione Nera. It consists of black ceramic panelling with different surfaces, black handles, applications and technical details. For this reason, the Roto Solid C concealed hinge impressed Fehring not only with its proven product quality.

“Black is the new grey. Roto Solid C is a perfect fit.”

To be able to honour the promise of a high degree of functional safety for Versco main doors over two or three decades, the company relies on high-quality profiles and hardware. “It only makes sense to update the look by replacing the panelling if the technical reliability of the door is fully maintained,” explains Fehring.

Of equal importance to the building element professional is the fact that Roto Solid C can support door leaves with a weight of up to 140 kg and an opening angle of up to 110°. The concealed door hinge has proven its effortless durability even over 400,000 cycles. Its measured functional life is therefore far beyond the value set by the standard.

Installation made easy

The door hinge’s “FixClick” function makes mounting the leaf simpler and more secure. Once the door leaf is mounted, the height is

adjusted centrally and quickly only at the bottom-most hinge. Because the hinges are easy to access, it is possible to adjust the height and gasket compression as well as perform lateral adjustment at a later stage without any problems. Thanks to the self-lubricating bush, Roto Solid C also moves any aluminium door without ever requiring maintenance.

“Our customers appreciate this ease of installation.”

This became clear back at the start of the year during central customer training sessions. “And end customers are happy to hear that our doors achieve burglary resistance class RC 2,” adds Fehring to round off the wish list of the decision-makers involved in choosing a supplier.

A team player for a partner

However, for the decision-makers at Versco, completely different details played the most important role at first, long before the launch

of Roto Solid C at the start of this year: “For us, it was important that the door hinge could actually be adapted to the Wicona aluminium profile chosen by us within a short space of time – as promised. Roto’s technicians met their match here and they did a really good job,” is Fehring’s positive conclusion. The angle of rotation of Roto Solid C was optimised to match the profile in an extremely short space of time and in direct coordination with Wicona, and the hinge support was modified.

“Now tight sealing, easy installation and good design impress.”

This got Versco off to a good start in 2020. “By collaborating with Roto, we have been able to improve the benefits for fitters while once again vastly increasing the variety in the design,” he explains. “These doors look great and their technology can’t be beaten – based on my experience, there’s nothing standing in the way of long-term success.”

www.versco.de

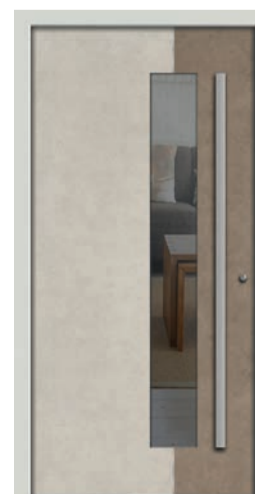
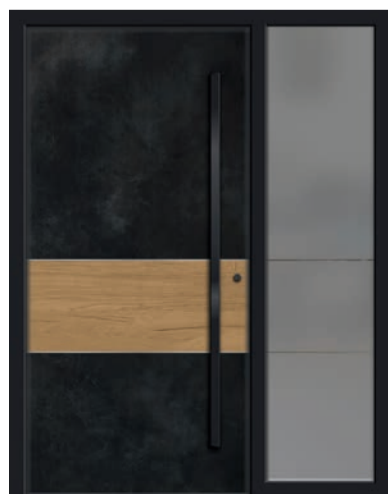


➤ **Product information for the Roto Solid C concealed door hinge**

www.roto-frank.com/en/roto-solid-c



| Door panels made from ceramic, timber, aluminium, glass, etc. on main doors from the Quattro Elementi series can be simply replaced if tastes or the facade design change.



Carl F Groupco Limited, United Kingdom

Roto FRH Uni is setting standards

■ **New at Roto** Carl F Groupco has been supplying window manufacturers in the United Kingdom with window and door hardware from all over the world for many years now. This includes Top-Swing fully reversible hinges from Roto.

“Fully reversible hinges are among our most important products,” states Julie Warner, who has been working at Carl F Groupco for 31 years and is responsible for this product segment, among others, in her role as product manager. “These are the best and most important products, I’d like to add.”

Clear trend towards increased comfort

Regardless of which profile material a window manufacturer is using and which functions their building elements have to fulfil, the highly specialised firm provides the necessary hardware. Julie Warner offers the following description of the market: market studies show that between 65 and 75% of hardware for outward opening windows is made up of the traditional UK Top-Hung and Side-Hung windows. However, the market for axial turning windows equipped with Top-Swing hardware is “very lively and experiencing growth.”



Roto FRH Uni turns the window sash by 170° into the cleaning position. Photo: Carl F Groupco

Ordered today – delivered tomorrow

Distributors have to overcome a very particular challenge: “Our customers place the highest demands on our delivery reliability. We have to be able to deliver from one day to the next,” is Julie’s description of how the company has to perform. In the United Kingdom, it is not normal for manufacturers to store hardware themselves. “Our stock levels are therefore relatively high for all frequently requested items and amount to a value of more than €500,000 at all times.” This enables Carl F Groupco to process around 98% of all orders within one day. Needless to say, a high-performance hardware industry is also crucially important for success.

“Roto has been helping us with delivery reliability that has been outstanding for years.”

Carl F Groupco sells around 7000 different items. A great deal of commitment has gone into making the Top-Swing fully reversible hinges from Roto among the most successful on the market. The decisive factor in this was also the technical support, which both Carl F Groupco and Roto specialise in.

Impressive product and brand

“I have been responsible for fully reversible hinge products for around 20 years,” continues Julie. “This means that I can fulfil virtually any planning task with customers straight away and can also provide them with the necessary certificates and proof of usability.” Whenever a fully reversible hinge with locking function is needed for a safe window, for example in a high-rise building, it is virtually a certainty that it will be one of Roto’s.

“With 25,000 cycles, the Roto FRH Uni fully reversible hinge meets the requirements of class 5 in accordance with DIN EN 13126-11: 2008. Its high-quality Roto Sil coating guarantees corrosion resistance in accordance with DIN EN 1670 – also in the highest class, class 5. Many window manufacturers swear by this product for good reason.” Julie is certain that “the recently completed further development will ensure that this remains the case.” There are practically no problems or even complaints.

“The complaint rate for the Roto FRH Uni is virtually zero.”

Two become one

The specialist believes that the redesigned fully reversible hinge is helping Roto assert its market leadership in the Top-Swing hardware segment in the United Kingdom. Ultimately, the proven product is now an even better fit for the everyday work of window manufacturers, while stock-keeping at Carl F Groupco has become simpler.

She is convinced that the new Roto fully reversible hinge is attractive to window manufacturers. The explanation: there used to be two versions. The fully reversible hinge now comes with an integrated comfort component as standard, so that the sash can be closed from the ventilation position simply by pulling it shut. If the comfort component is removed, the locking knob has to be pressed to close the sash.

Julie explains the benefits of this change as follows: “Combining the two established versions into the same fully reversible hinge reduces the risk of our customers making a mistake when ordering and further increases our delivery reliability. The window manufacturer does not have to decide whether or not to fit the comfort component until installation according to the customer’s wishes.”

Lock-in positions

When opening the window, the sash automatically locks into the first position. The

comfort component of the Roto FRH Uni fully reversible hinge. If the comfort component is not removed, the sash can be closed by simply pulling it shut without active unlocking, in other words without pressing the locking knob.



Roto FRH Uni for Top-Swing windows with a height of 308 to 1700 mm. The window handle is available with a push-to-open function as standard or in a lockable version. Photo: Carl F Groupco

user presses the locking knob to move the sash from this position to the second ventilation position. The open sash is prevented from unintentionally slamming shut, for example due to a draught, because the sash engages in the chosen ventilation position, where it is locked and secured by the turn lock.

Cleaning the exterior pane safely

To open the sash even further in order to clean the window, the locking knob is pressed again, the sash is held at the top and fully turned around. Since the sash swings outwards when turned, damage to furniture in front of or next to the window is reliably prevented. After turning, the outer side of the window can be cleaned simply and safely from the inside.

The window handle from Roto for outward opening windows is available with a push-to-open function as standard or in a lockable

version. This ensures added security, for example for families with children. Windows with the Roto fully reversible hinge can also be used as an emergency exit.

For tight sealing and effective burglary protection

The ease of installation of the FRH Uni fully reversible hinge is enhanced by the easy-to-install reverse-action security espagnolette from Roto. The security lock with up to eight reverse-action twin cams and four strikers ensures the best possible burglary protection.

The integrated gasket compression adjustment simplifies window adjustment during installation and helps make the window more tightly sealed. Versions are available with different backsets (20 and 22 mm) and cam heights (8, 9.5 and 10.5 mm). The striker with its robust baseplate and double screw fixing helps make the profile more stable.

Dedicated and efficient

Julie believes that “Roto has made a good product even better” and, at the end of the interview, described how Carl F Groupco is intending to continue the successful development of the previous year: “We will continue to play a part in equipping more comfort windows with high-performance hardware in the United Kingdom. Carl F Groupco also aims to continue impressing with the utmost dedication in technical consulting and the ability to deliver.”

www.carlfgroupco.co.uk

One of the United Kingdom’s largest hardware dealers, Carl F Groupco Ltd. in Peterborough in the East of England



Julie Warner, Product Manager Carl F Groupco Limited



Produce Tilt&Turn windows more efficiently with connecting rods delivered ready to use by Roto Aluvision.

Efficient and reliable production

Ready-to-use connecting rods for aluminium windows

■ **Aluvision Aluminium window manufacturers who work with Roto AL or Roto AL Designo will from now on be able to outsource a part of their processing. Roto Aluvision is offering a new service for greater process reliability in window production.**

For all orders with a volume of 100 or more windows of the same type, ready-to-use connecting rods are supplied to order. Smaller batch sizes are also possible after consultation with the customer adviser. This means that employees in window production are no longer required to adjust the punches, crop the connecting rods to size and punch the holes required depending on the hardware configuration.

Configuration with Roto Con Orders
To order ready-to-use connecting rods, the window manufacturer puts together the required hardware in the Roto Con Orders hardware configurator as before. The “ready-to-use connecting rod” option is selected. The technical master data is generated specifically for the order. Finally, the order is transmitted to the Roto Aluvision customer adviser by a form generated in Roto Con Orders.

Calculated for millimetre precision
Retail prices are calculated and offered on a case-by-case basis. The customer adviser takes into account the length of the connecting rod, accurate down to the millimetre, and the number of punched holes to be produced. Once the price has been accepted and confirmed by the customer, the connecting rods are manufactured to order. The ready-to-use connecting rods will be shipped no later than 14 working days after receipt of the order. They come with an information label and delivery note. In this way, the shipment can be clearly assigned to the job to be carried out.

More efficient production

The ready-to-use connecting rods can be inserted into the sash profile without any further processing steps. “Simply push the connecting rod into the hardware groove and connect it to the corresponding sash hardware components – and that’s it,” explains Matthias Kosog, Product Manager Tilt&Turn Roto Aluvision. It is possible to produce ready-to-use connecting rods for any application and for any resistance class up to RC 3.

Avoiding disruptions

Working with connecting rods and hardware is becoming simpler thanks to the new Roto service, while process reliability is also

increased. The risk of disruptions in the production process caused by incorrectly calculated or incorrectly produced connecting rods is reduced. European manufacturers of aluminium windows can now take advantage of the new service.

Time is money

“Roto AL” and “Roto AL Designo” also result in time savings in aluminium window production, even in the standard version: the fixed dimension system for frame components from these hardware product ranges ensures that they always have the same positioning dimensions and can be positioned with ease using the corresponding positioning jigs.



■ New for Roto AL and Roto AL Designo: ready-to-use connecting rods for windows and balcony doors of all opening types up to resistance class RC 3.



■ Adjusting the punches, cropping the connecting rods and punching the required holes – Roto Aluvision will now take care of this.



➤ **Roto AL – universal hardware for aluminium windows and balcony doors**

www.roto-frank.com/en/roto-al

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