

# **WINDOWS**

Highlights of Architecture 2019/20



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Warranties/Certifications

# **Design**Styles

Highlights of architecture







#### studic

Follows a very clear line in its design. This style with its cutting edge shapes and diminished appearance gives a contemporary and unconventional feel.

## home pure

Meets the demands for a modern and straight-lined style creating bright living environments.

### home soft

Feels friendly and cozy and offers many design varieties – from elegant to playful.

## ambiente

Stands out with its traditional shapes – timeless classical and elegant. Its composition is elaborately designed and conveys a homely feel.

#### WINDOWS AND DOORS FOR YOUR DREAM HOUSE

Architecture is as diverse as the people who live in it. The style of a house is not only shaped by building design, especially windows and doors also underline its character considerably.

You can fulfill your personal idea of living with Internorm windows and doors. Internorm is offering you a suitable solution.

To help you find the window and door solutions which fulfill exactly your requirements for architecture, design and comfort among the multitude of possibilities in shape, colour and material, you can choose from the different Internorm design styles: studio, home pure, home soft and ambiente.

#### TIMBER AND TIMBER/ALUMINIUM WINDOWS



HF 310



HF 410



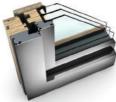
HV 350



HF 210



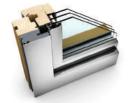
HF 310



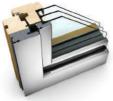
HF 410



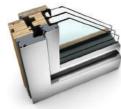
HV 350



HF 210



HF 310



HF 410



HV 350



HF 210



HF 310



HF 410



HV 350





OVERVIEW WINDOWS
UPVC | UPVC/aluminium









home pure



home soft



ambiente



#### **UPVC WINDOWS**



KF 320



KF 500







**KF** 310



**KF** 410



**KF 310** 



**KF 410** 

#### UPVC/ALUMINIUM WINDOWS



KF 320



**KF 410** 



**KF** 500



**KV** 440



**KF 310** 



**KF** 410



**KF** 500



**KV 350** 



**KV** 440



**KF 310** 



**KF** 410



**KV** 440



**KF** 310



**KF** 410



**KV** 350



**KV 440** 

# HF 210 TIMBER/ALUMINIUM WINDOW

#### **PROPERTIES**

*	Thermal insulation	$U_w$ as low as 0.67 W/(m <sup>2</sup> K)

Sound reduction up to 46 dB

Security RC2

Locking concealed

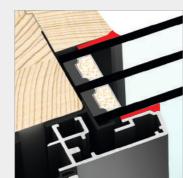
\* \* Construction depth 85 mm

Design style home pure home soft ambiente

I-tec Glazing









#### HF 210

Timber, aluminium combination eliminates the need for exterior maintenance, due to the aluminium attachment clad which protects the timber from weather conditions. The square-edged aluminium profiles of frames and windows can be designed in many colours and facilitate countless design possibilities of the exterior facade. I-tec glazing, the continual all around bonding of the glass pane, offers excellent stability, security protection as well as thermal insulation and sound reduction. Concealed hardware on the inside of HF 210 ensures a continuous, comfortable timber surface.

# HF 310 timber/aluminium window



# Thermal insulation Uw as low as 0.62 W/(m²K) Sound reduction up to 46 dB Construction Concealed Construction depth Studio home pure home soft

**PROPERTIES** 

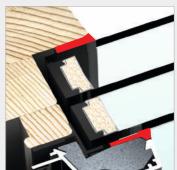
I-tec Glazing

ambiente



Passive house certified







#### HF 310

A combination of timber/aluminium and highly insulating thermal foam in between the frame & sash. The HF 310 provides excellent thermal insulation values, natural timber refined with subtle paints, weather-resistant aluminium on the outside render the HF 310 the most attractive option among the timber/aluminium windows. Due to the same, flush design of the aluminium clad, HF 310 can be combined with UPVC window KF 410. All around bonding of the glass pane (I-tec glazing) ensures excellent stability and security protection. Triple continuous gaskets protect the interior area from exposure to the rain.

# HF 410 timber/aluminium window

#### **PROPERTIES**

* Thermal insulation	U <sub>w</sub> as low as 0.64 W/(m²K)
----------------------	---------------------------------------

**? ( Sound reduction** up to 45 dB

Security

Locking concealed

\* Construction depth 85 mm

Design style studio home pure home soft ambiente



I-tec Core

RC1N, RC2

studio



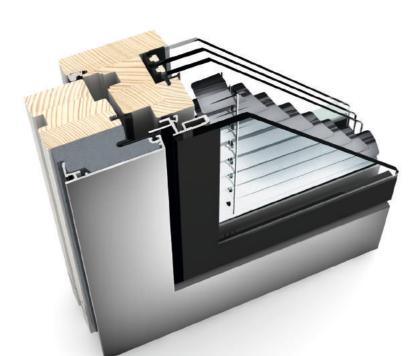




#### HF 410

Sustained materials and colours of the interior decoration underline your minimalistic living style and bring individual elements into the forefront. HF 410 adapts perfectly to your interior design. Different colours and timber types offer you countless possibilities for your individual colour design of your interior spaces. Grey Oak as interior colour agrees with the modern living style with clear forms, plain materials and modest colours. Made to order, opening and fixed glazed windows can be integrated to large areas.

# HV 350 timber/aluminium window with integrated blind



<b>  </b>  *	Thermal insulation	$U_w$ as low as 0.60 W/( $m^2$ K)
9 (0	Sound reduction	up to 47 dB
	Security	RC2
	Locking	concealed
* *	Construction depth	85 mm
	Design style	studio home pure home soft

**PROPERTIES** 

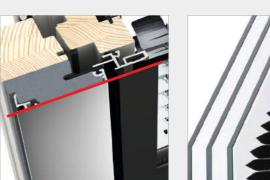
I-tec Glazing

ambiente

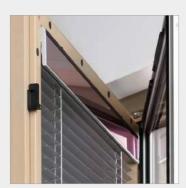
I-tec Shading



studio







#### HV 350

The sun and privacy protection integrates harmoniously into this flush window and offers quadruple protection all in one window with excellent thermal insulation and sound reduction values. Blinds, Venetian blinds or Duette® blinds are situated between the panes and therefore protected from dust. The energy self-sufficient I-tec shading does not require any external power source due to the photovoltaic module and batteries. Integrated automatic functions such as day/night recognition and intelligent heat protection can be activated simply via your tablet or Smartphone, I-tec Smart Window is also available.



©Scotia Windows & Doors





# KF 320 upvc & upvc/aluminium window

#### **PROPERTIES**

*	Thermal insulation	U <sub>w</sub> as low as 0.65 W/(m <sup>2</sup> K)

Sound reduction up to 45 dB

Security RC1N, RC2

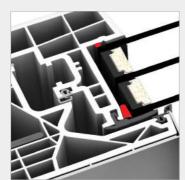
Locking concealed

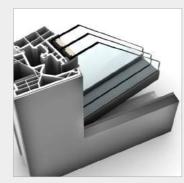
Construction depth 71/74 mm

> Design style studio

> > I-tec Glazing



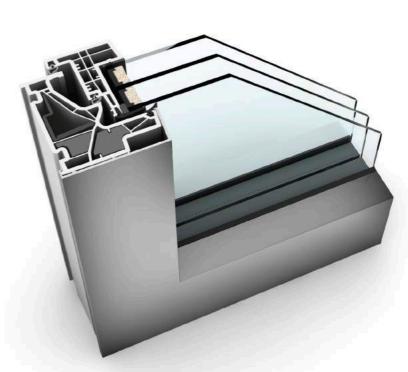




#### KF 320

The innovative glass sash of the KF 320 gives the impression of fixed glazing, yet it is still an openable window. The narrow, square-edged window frame highlights the minimal architecture of the design style studio, in either the classic white UPVC version or with aluminium attachment clad. Three-sided rendering of the frame achieves your dream of almost frameless glass architecture. I-tec glazing ensures excellent stability, thermal insulation and security through surrounding bonding of the glass pane.

# KF 500 upvc & upvc/aluminium window



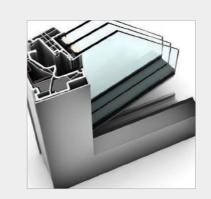
*	Thermal insulation	U <sub>w</sub> as low as 0.61 W/(m²K)
<b>9</b>  (()	Sound reduction	up to 46 dB
	Security	RC2
	Locking	fully integrated
**	Construction depth	93 mm
	Design style	studio

**PROPERTIES** 

I-tec Glazing I-tec Locking

home pure

I-tec Ventilation







#### KF 500

KF 500 combines innovative design and technical know-how. The window sash is not visible from the outside due to its glass appearance and cannot be distinguished optically from fixed glazing. This sash also conceals the revolutionary I-tec locking which renders levering of the window impossible, unrivalled in the branch. Integrated coverings push on to the frame interior on all sides when locking and therefore offer maximum security protection. KF 500 can additionally be equipped with I-tec ventilation, a ventilation system integrated into the window

# KF 410 upvc & upvc/aluminium window

#### **PROPERTIES**

* Thermal insulation	$U_w$ as low as 0.62 W/( $m^2$ K)
Sound reduction	up to 45 dB
Security	RC1N, RC2
Locking	concealed
** Construction depth	93 mm
Docian style	studio home pure

Design style

I-tec Glazing

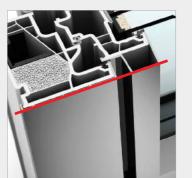
home soft

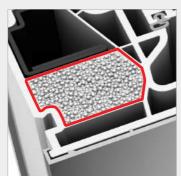
ambiente

I-tec Ventilation

I-tec Insulation

studic



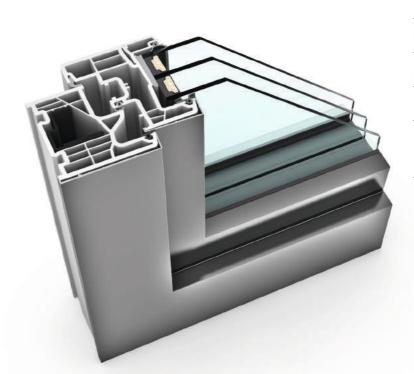




#### KF 410

The completely flush transition of frame and sash combines KF 410 to one unit. Once the frame is rendered into the brickwork on three sides, only the narrow, square-edged sash frame remains visible. The frame is insulated seamless through the new insulation technology and thermal insulation is considerably improved. Technological advances with airing is provided by the I-tec ventilation. The ventilation system which is integrated in the frame ensures sufficient fresh air and ideal room climate 24/7.

# KF 310 upvc & upvc/aluminium window



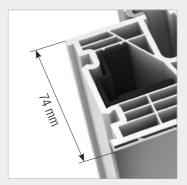
		— —
*	Thermal insulation	U <sub>w</sub> as low as 0.69 W/(m²K)
<b>9</b>  (()	Sound reduction	up to 45 dB
	Security	RC1N, RC2
	Locking	exposed
<del>* *</del>	Construction depth	74 mm
	Design style	home pure

**PROPERTIES** 

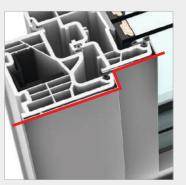
I-tec Glazing

ambiente

home pure







#### KF 310

This sleek new window features the proven and reliable technology of all our Internorm windows. It is characterised by the best thermal insulation and sound reduction values, as well as all round bonding of the glass pane with the window sash. KF 310 is available in a large selection of colours, handles and glazing, as well as a balcony and patio door and now also as a French balcony. The square-edged exterior design of the frame and sash matches the design style home pure.



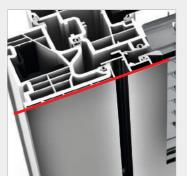
# KV 350 upvc/aluminium window with integrated blind

#### **PROPERTIES**

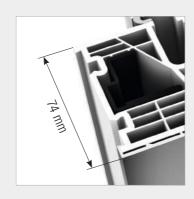
	* Thermal insulation	U <sub>w</sub> as low as 0.79 W/(m <sup>2</sup> K)
$[\mathfrak{D}]$	Sound reduction	up to 44 dB
$\left[ \mathscr{J}\right]$	Security	RC1N, RC2
	Locking	exposed
*	* Construction depth	74 mm
	Design style	home pure ambiente











#### KV 350

The modern and narrow window KV 350, with integrated blinds, features four main advantages. As well as the best sound reduction and thermal insulation, sun and privacy protection are also integrated in the window directly between the glass panes. This helps with cleaning - the blind is protected by glass panes from wind, bad weather and dirt. Sun protection is now also available in refurbishments or on facades, even if they do not permit roller shutters. I-tec shading works fully self-sufficiently and offers many other useful functions.

# KV 440 upvc/aluminium window with integrated blind



<b>↓</b>  * Thermal insulation	U <sub>w</sub> as low as 0.64 W/(m <sup>2</sup> K)
<b>୭</b>   <b>®</b> Sound reduction	up to 45 dB
Security	RC1N, RC2
Locking	concealed
** Construction depth	93 mm
Design style	studio home pure home soft ambiente

**PROPERTIES** 

I-tec Glazing

I-tec Shading

I-tec Ventilation

I-tec Insulation







#### KV 440

The window with integrated blinds KV 440, also offers all around comfort besides flush design. Sun and privacy protection is integrated between the panes and therefore protected from dirt. routine cleaning of individual slats is a thing of the past. I-tec shading also offers many advantages when it comes to performance. The sun protection can be controlled via photovoltaic module and batteries and does not need any external power source. I-tec SmartWindow enables convenient operation via your tablet or Smartphone.



©ecohaus South West Ltd.





#### YOUR FINGER IS THE KEY

No need to look for that key again due to the finger scanner or keypad. With Internorm, these technologically clever systems are fastened to the door leaf or integrated flush in the door leaf or handle.



#### FINGER SCANNER

The integrated finger scanner replaces the conventional key in a convenient way without exception. The control unit is space-saving and securely situated in the door sash. Keys, cards or codes can no longer be forgotten, lost or stolen.

**Simple.** You can open the door by simply "sliding your fingers across". You can save your own authorised individual meaning, no need for technicians.

**Convenient.** You always have your key "at hand". This clever software is so intelligent that it learns with every scan and even recognises growth in children's fingers or changes in user behaviour.

**Secure.** Your unique finger print is more secure than a key which can be lost or stolen. Control of the system from the outside is impossible. Removal of this is also impossible.

Scanner generally with bluetooth (BT) interface and optionally also with transponder. Programming and admin of finger scanner via Smartphone or tablet. The bluetooth connection is secured through a 6 digit coupling code. Suitable for Apple and Android phones or tablets.



#### KEYPAD

The ekey home integrated keypad is fitted directly into the door sash or the wall next to the door. Only the ultra-flat decor element is visible.

The system is compatible with all e-openers and electric locks. A cable transports an encoded opening signal to an electronic relais. The relais sends an opening impulse to the electric lock. Control from the outside is therefore impossible.

Opening occurs by typing in a four to ten digit code of your choice. A six digit code is very secure and easy to remember. A pattern can even be taught via the touch screenand by mobile phones.

Up to 99 codes can be programmed. Each user can therefore have his own access code. For example, this option allows the code to be deleted and replaced with a new code as required.

#### SECURE WITH WINKHAUS CYLINDERS

There is a multitude of additional components available such as high security cylinders, door blocks, signal lights etc. For more information please contact your Internorm [1st] window partner.



The **standard cylinder** is equipped with anti-scanning and drilling protection and two steel pins. It can be locked from both sides, this means, even if the key is in the lock on one door side, it can be locked or unlocked from the other side.



The high security cylinder with 3D patented antiscanning and drilling protection as well as being unable to remove or loosen. This specific key shape means smoothness of locking and prevents bending and breaking of the key. Lockable from both sides. The symmetrical reversible key can be easily inserted into the cylinder.



Each high security cylinder comes with a personal **security card**. It serves as important proof of legitimacy when reordering cylinders or keys.

#### ADDED SECURITY



Door block TSH serves as opening limiter. It is operated outside via the main lock (no cylinder outside). Operation on the inside via a turn knob.



Door can only be opened while contact is given (button pressed) with the **electric door opener/ETOE**.

#### AT A GLANCE



**Door spyhole** is available in chrome or brass.

#### TIMBER/ALUMINIUM ENTRANCE DOORS



#### ALUMINIUM ENTRANCE DOORS





©AT Eco Windows & Doors Limited



# AT 410 ALUMINIUM ENTRANCE DOOR

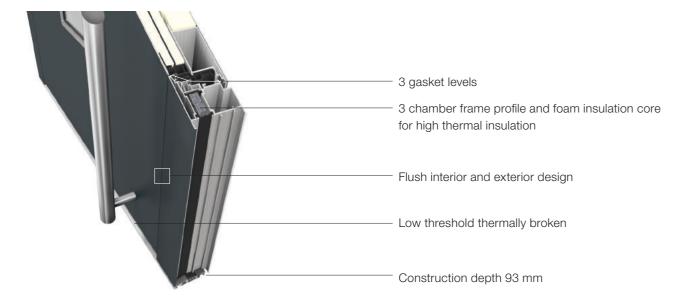
#### COMPLETE IN FORM - FLUSH DESIGN IN PERFECTION

The flush design of frame and door leaf is perfected through concealed hardware, level key hole cover plates, sunken recessed handles and heavy duty joiners as well as flat glass surrounds.



Online door designer







FO Colour: HFM05 Handle: RGS01 Order no.: 19-003



FG Colour: HM716 Handle: MGSE10 Designer elements: Heavy duty joiners Order no.: 19-084



Colour: HM716 Handle: TEG15 Glass: Satinato white Designer elements: Heavy duty joiners Order no.: 19-020



#### FΚ Colour: Frame RAL 9017, sash SD03 Art-Beton Handle: SG13 Glass: Satinato white

Designer elements: Heavy duty joiners

Order no.: 19-007

PN

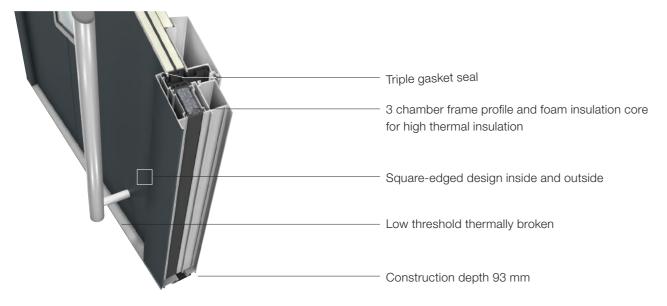
Colour: Frame HM907, sash HM907, M916 Handle: EGS06 Glass: Satinato white Alunox glass surround Order no.: 19-021

# AT 400 ALUMINIUM ENTRANCE DOOR

#### PURISTIC - CREATES CLEAR LINES

The smooth door leaf and the square-edged frame creates clear lines which are further emphasized through straight-lined designer elements or glass cut-outs, bar handles as well as raised or flat heavy duty joiners.







FM Colour: Frame HM704, sash HM704, M916 Handle: KGS03 Order no.: 19-008



FK
Colour: HM716
Handle: SG13
Designer elements: Heavy duty joiners
Order no.: 19-005



Colour: HM716 Handle: EGS01 Glass: Satinato white Order no.: 19-010



Colour: Frame HFM12, sash HFM12, M916 Handle: MGSE6 Glass: Satinato white Order no.: 19-026



PK Colour: M916 Handle: RGS03 Glass: Satinato white Order no.: 19-034



FA
Colour: Frame HM716,
sash SD06 Art-Steel
Handle: KGS03
Order no.: Available on technical request

 $Not all \ designs \ are \ illustrated \ in our \ brochure. \ Please \ visit \ our \ website \ www.internorm.com \ to \ access \ our \ door \ designer.$ 

# AT 310 ALUMINIUM ENTRANCE DOOR

#### STRAIGHT-LINED - STUNNING DESIGN FEATURES

The combination of flush door leaf outside and profiled door leaf inside offers numerous design possibilities. The clear shapes are underlined by millings, glass cut-outs and designer frames.







SA
Colour: HFM05
Handle: HS30
Glass: MDNL
Order no.: 19-037



SJ
Colour: HFM22
Handle: MGSE6
Glass: Satinato white
Order no.: 19-038



Colour: RAL5010 Handle: MGSE6 Glass: Satinato white Alunox glass surround Order no.: 19-029



FK
Colour: HM716
Handle: SG13
Designer elements: Heavy duty joiners
Order no.: 19-005



PM Colour: HF113 Handle: FS10 Glass: Satinato white Order no.: 19-033



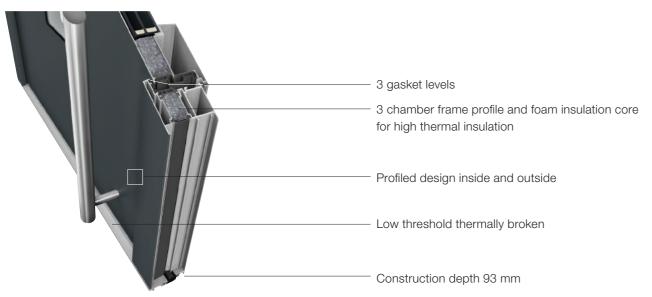
PK
Colour: M916
Handle: RGS03
Glass: Satinato white
Order no.: 19-034

# AT 305 ALUMINIUM ENTRANCE DOOR

#### LINEAR LINES - PURISTIC DESIGN

The intelligent plate construction with insulation glass core ensures excellent thermal insulation and sound reduction as well as maximum stability. Standard triple-point locking with two bolts and one main bolt render these entrance doors additionally secure.







#### Colour: HFM12 Handle: RGS05 Glass: Satinato white Order no.: 19-030



Colour: HFM11
Handle: RGS02
Glass: Satinato white
Order no.: 19-032



Colour: HFM05 Handle: KGS04 Glass: Satinato white Order no.: 19-012



DA Colour: HDS08 Handle: HS40 Glass: Satinato white Order no.: 19-016

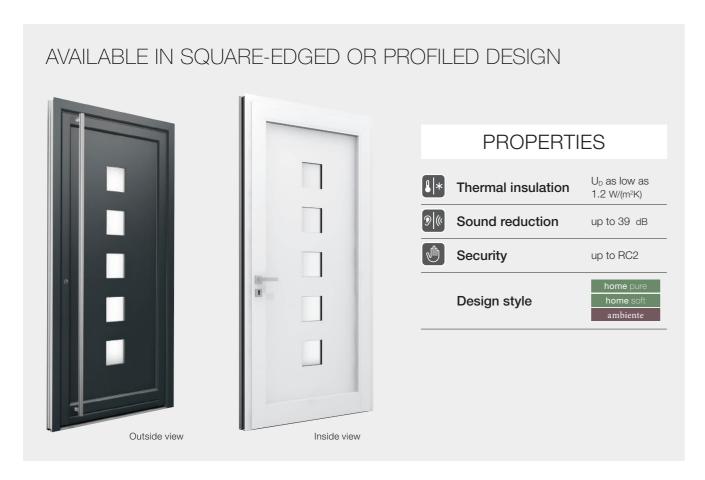


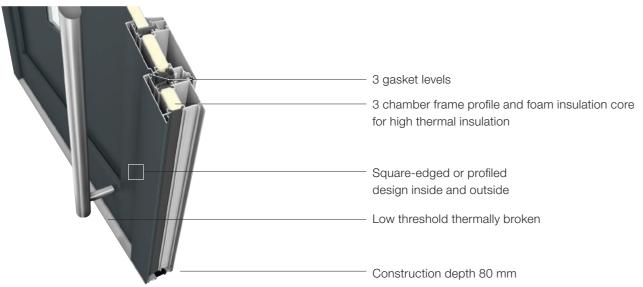
GA
Colour: Frame HM716
Handle: HS42
Glass: Satinato white
Order no.: 19-015

# AT 200 ENTRY MODEL

#### WITH MANY VARIATIONS - FROM TRADITIONAL TO CONTEMPORARY

This entrance door can be designed in many ways with beaded sash, designer ornaments and Georgian/feature bar solutions. AT 200 features a profiled door leaf inside and outside which can alternatively be square-edged.







Colour: Frame M916, sash M916, HM735 Handle: HS10 Glass: Satinato white Order no.: 19-053



EC-A3B
Colour: HM907
Handle: EGS05
Glass: MR3
Alunox glass surround
Order no.: 19-054



RA-A1B
Colour: DM01
Handle: CS100
Glass: D72
Order no.: 19-055



VA-K2B Colour: HM704 Handle: TEG14 Glass: Satinato white Order no.: 19-056



LU-B3B
Colour: Frame HM716, sash HM716, M916
Handle: GD10
Glass: Satinato white
Order no.: 19-065

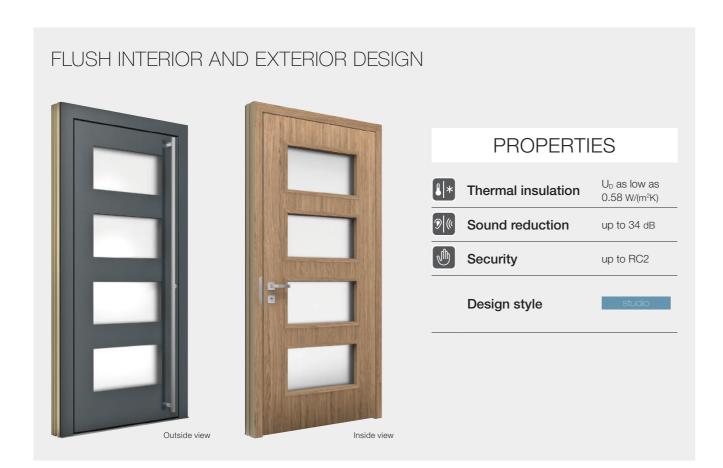


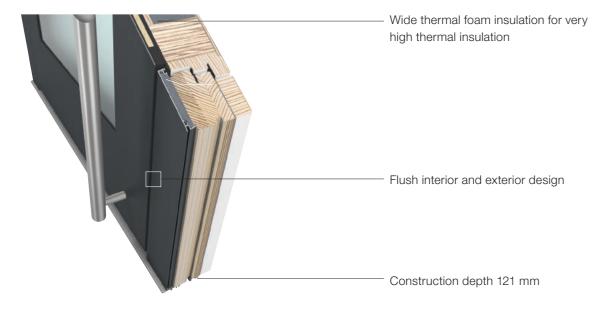
SE-R0B Colour: HFM02 Handle: TEG10 Glass: Linea Order no.: 19-049

# HT 410 timber/aluminium entrance door

#### FLUSH DESIGN

The smooth flow from frame and door leaf, concealed hardware, level key hole cover plates, recessed handles and millings as well as flat glass surrounds create the perfect design.







# Colour: HFM14 Handle: MGSE8 Designer elements: Heavy duty joiners Order no.: 19-004



FD Colour: Frame HM716, sash HM716, HM907 Handle: RGS05 Order no.: 19-009



Colour: HFM05 Handle: KGS04 Glass: Satinato white Order no.: 19-012



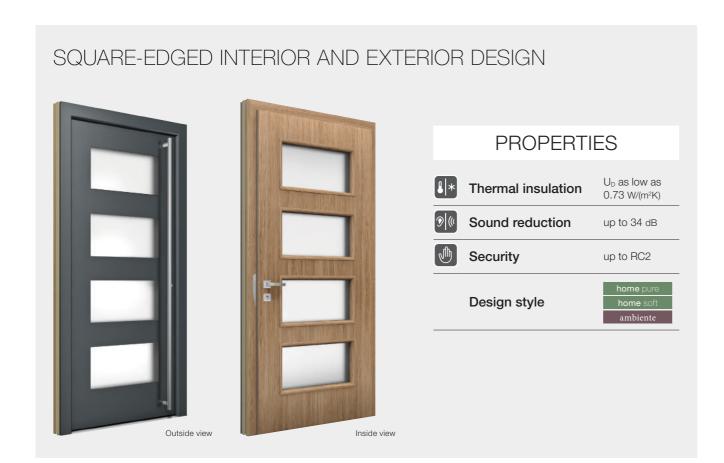
#### DG

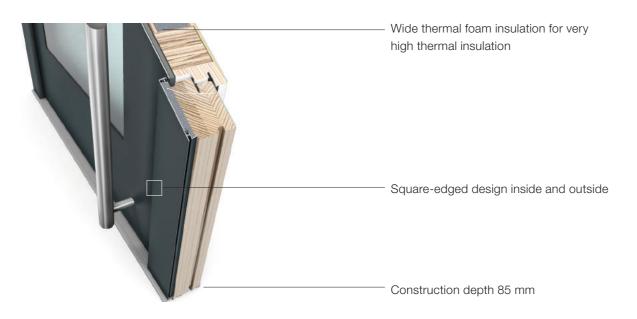
Colour: M916 Handle: SG17 Glass: Satinato white Alunox glass surround Order no.: 19-013

# HT 400 timber/aluminium entrance door

#### PURISTIC LINES

The smooth door leaf and the square-edged frame create clear lines which are emphasized by continuous glass layers, straight-lined designer elements, bar handles as well as stainless steel attachments.







FL Colour: Frame HM716, sash HM716, HM735 Handle: SG13 Order no.: 19-006



PE
Colour: HM716
Handle: EGS01
Glass: Satinato white
Order no.: 19-010



Colour: Frame HF735, sash HF735, HF716 Handle: MGSE10 Glass: Satinato white Order no.: 19-011



FK
Colour: HM716
Handle: SG13
Designer elements: Heavy duty joiners
Order no.: 19-005



FM Colour: Frame HM704, sash HM704, M916 Handle: KGS03 Order no.: 19-008



Colour: HM716
Handle: TEG15
Glass: Satinato white
Designer elements: Heavy duty joiners
Order no.: 19-020



©Infinite Windows & Doors









#### **ADVANTAGES**

- No electricity needed due to the photovoltaic module
- · Use of energy gain in winter reduction of heating costs
- Automatic functions such as day/night recognition and measuring of solar irradiation
- Manual control available directly at the window frame
- Convenient control also via SmartHome solutions such as I-tec SmartWindow or Loxone Smart Home
- Photovoltaic module and sun protection integrated between glass panes



# ENERGY SELF-SUFFICIENT SUN PROTECTION.

Especially with refurbishments, you want as little dust and dirt as possible. Unnecessary work for additional power lines is not something you want to do.

Here, I-tec Shading is the perfect solution. The energy required for the drive is gained directly by the window through a photovoltaic module which is integrated into the blind cover. As no external power line is required, no extra work ie.

structural provisions have to be taken care of.

All cables, chargers, modules etc. are positioned directly in the window. The blind can be moved up and down via a remote directly at the window or via special automatic functions.

Day/night recognition, for example, opens and closes the blind from dawn til dusk. Measuring the solar irradiation and temperature prevents overheating of the rooms. The blind, however, can also be operated via SmartHome solutions such as I-tec SmartWindow.

The energy self-sufficient I-tec Shading can be used with all Internorm window systems with integrated blinds.



## I-tec SmartWindow

# EASY OPERATION. CONVENIENT CONTROL.

Intelligent home controls and SmartHome solutions will simplify your life. Music, light, heating and much more can be conveniently operated with this, whether you are at home or on your way home.

Internorm now offers mobile control around the window with I-tec SmartWindow. Besides its own opening control of windows, I-tec Ventilation, I-tec Shading, sun protection and fanlights can be operated via Smartphone or tablet. A simple touch of the finger moves blinds up and down, adjusts light according to your requirements or regulates the ventilator volume. Fanlights can easily be opened or closed. Also open, tilted and closed windows can easily be monitored via the App.

The App I-tec SmartWindow can be downloaded free of charge together with its installation instructions from the App Store or from Google Play.



#### **ADVANTAGES**

- Intelligent control all around the window free App
- Mobile operation of I-tec Ventilation, I-tec Shading, sun protection and fanlights
- Opening control of your windows even when you are away
- · Easy operation
- · Individual adjustment





©Infinite Windows & Doors

# INTERNORM AUTOMATION FOR YOUR SMART HOME

#### COMFORT AND CONVENIENCE. INTELLIGENTLY AUTOMATED.

Internorm's technologically advanced i-tec range can be fully integrated into a Loxone Smart Home to offer unparalleled convenience, energy-efficiency, control and security. In a time where there is greater demand on the harmonious balance between design, technology and comfort; a real smart home can take care of thousands of tasks for you so that you have more time to enjoy the important things in life.

#### Automatic shading in your smart home

When integrated with a Loxone Smart Home system, the revolutionary i-tec shading range can be fully automated based on time, day, weather conditions, room temperature, presence, and more. All without you having to lift a finger.

#### Smarter security for peace of mind

The in-built sensors of the i-tec range can also be incorporated into your smart home security features; offering more peace of mind. This allows your home to know the state of each window. At a glance on your smartphone, you'll know whether a window is open, closed, tilted or locked. Plus, if a window is opened while the burglar alarm is set, your smart home will take action and alert you straight away.

Whether it's managing the room climate, simulating presence, enhancing security, or providing privacy - your smart home will instinctively know how to make the most of the i-tec range in your build. Discover even more smart home possibilities by centralising the control of your i-tec range as part of your Loxone home automation system.

#### FULL APP CONTROL

# Shading Overview Al to adversatic mode Al to adversatic mode Shocken & Oliver Long Room Matter Statiliz Social's Bedream A

#### A single app

The Loxone Smart Home App gives you complete control of the I-tec products in your home.

#### ADDITIONAL SMART HOME FEATURES



#### Working together

Centralising the control of your I-tec range as part of your Loxone system introduces additional smart home functionality. Discover how the I-tec range can be incorporated with the burglar alarm, heating and cooling schedule, and more - ultimately introducing greater convenience and energy-saving potential into your home.









# I-tec Core

# DURABLE WINDOW. COUNTLESS TIMBER VARIATIONS

Spacious and bright living with large glass openings requires exceptional window solutions.

Next to the highest stability and load-bearing capacity, the window frame should be as slimline as possible and match the interior design.

Internorm has developed a timber core with I-tec Core which achieves these requirements.

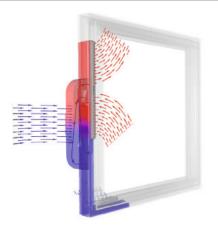
The narrow, bonded timber layers are, resistant, durable and robust - these have been previously used for stable roof beams and supports. Large window solutions, lift-sliding doors or panorama windows can therefore be easily manufactured. Additionally, the narrow frame design gives this window elegance. The new high-tech material is also resource-saving, sustainable and enables larger dimensions due to its exceptional load-bearing capacity. The timber of the window sashes can be matched to your individual design needs, flooring or doors, as besides the standard timber types for windows such as spruce and larch, the exterior is also available in oak, ash and walnut.



#### **ADVANTAGES**

- Durable core in window frame and window sash
- · Slimline view widths for more light
- Matching timber types and colours for your interior design – individual colour and timber variety
- · Attractive price/performance ratio
- Perfect combinability of window solutions
   windows, lift-sliding doors, panorama glazing





#### **ADVANTAGES**

- Each I-tec Ventilation and therefore each window and each room can be regulated individually
- Individual fresh air per room and as required for healthy living
- Less heat loss as full airing no longer necessary
- · Increased security as window remains closed while airing takes place
- · Integrated filters ensure air free from dust and pollen
- Operation available via I-tec SmartWindow or Loxone SmartHome
- · Fresh air without any outside noise



# FRESH AIR. REGULATED BY THE INDIVIDUAL.

We spend time in different rooms for different amounts of time and also use them very differently.

For example, we are in the bathroom usually only for a short amount of time and while showering produce, steam and therefore humidity. Whereas, we spend the whole night in the bedroom and emit  ${\rm CO_2}$  during sleep. Storage areas or guest bedrooms are usually only used short-term and need to be aired predominantly to prevent mould.

Our usage of individual rooms is therefore as different as the requirements for fresh air. Internorm has developed a ventilation system with I-tec Ventilation which is geared towards exactly these individual requirements. This ventilation system is integrated directly in the window frame and can be regulated at each window individually, depending on how much fresh air is needed; more for one room, less for another room. In automatic mode, I-tec Ventilation measures the humidity content of the used air and switches on automatically if needed.

I-tec Ventilation ensures fresh air and an optimum room climate.



## I-tec Locking

# FEEL SAFE. FEEL IMPORTANT.

Not only the people who surround us, but also how our living areas are furnished and the view to the outside contribute to us feeling well within our own four walls. To feel safe is also an important aspect.

You can be assured with the unrivalled I-tec Locking that your windows will offer reliable protection. Instead of customary locking pegs, flaps carry out precise locking of the window sash to the frame. These flaps, positioned in appropriately short distances on all four sides of the sash, press directly against the inside of the frame when locking the window. Levering of the window is practically impossible. These flaps also offer considerable advantages when cleaning windows. Hardly any parts of the sash protrude, closing parts are almost completely eliminated, only a smooth and easy to clean UPVC surface remains between the sections.

I-tec Locking is integrated as standard in UPVC or UPVC/aluminium window KF 500 and with lockable handle achieves security class RC2N.



#### **ADVANTAGES**

- Intelligent control all around the window free App
- Mobile operation of I-tec Ventilation,
   I-tec Shading, sun protection and fanlights
- Opening control of your windows also when you are away
- · Easy operation
- · Individual adjustment





#### YOUR ADVANTAGES I-tec Glazing

- · Maximum burglary protection
- · Increased stability
- · Increased thermal insulation
- · Improved sound reduction

#### YOUR ADVANTAGES

#### I-tec Insulation

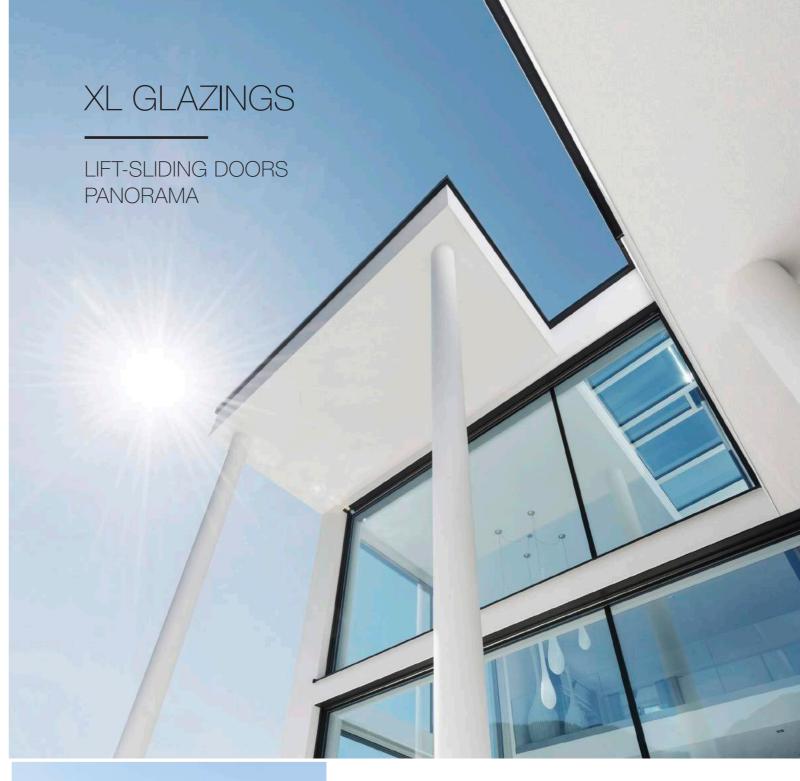
- · Granulate instead of foam
- · Improved thermal insulation
- · Hollow chambers filled completely



# CONTINUOUSLY EFFICIENT. SAFETY ALL AROUND.

Many window panes are only glued into the frame at a few points. The glass can easily be pushed out of the frame and levered out. Also the insulation foam is not always attached all around, so not ensuring optimum thermal insulation.

To ensure maximum security protection, Internorm windows are equipped with I-tec glazing already as standard. Here, the glass pane is bonded to the window sash continuously and without gaps. This bonding system ensures a strong connection from glass to sash on the one hand, on the other hand it enhances stability as well as thermal insulation and sound reduction. Despite this strong connection, the glass can still be changed easily. I-tec Insulation is already available as a standard feature with two Internorm window systems. A granulate is pushed into the frame interior with pressure and so evenly fills the hollow chambers completely. Thermal insulation is considerably improved.





Bright, light-flooded rooms create freedom for you and your family. Large glass areas extend the living space beyond its real border. This creates a new unlimited sense of space and at the same time offers a full view to the outside.

Internorm offers innovative solutions for modern glass architecture with frameless windows, fixed glazings, all-glass corners, large-scale lift-sliding doors, panorama windows and special solutions. Your ideas of maximum openness can become reality through a combination of these solutions.





The new UPVC or UPVC/aluminium lift-sliding door KS 430 creates light-flooded rooms and enlarges your home beyond its real borders. Without any effort the large-scale sliding elements can be opened to make even more space.

The KS 430 offers modern design and excellent comfort combined with high-quality technology:

- · More light through large-scale glazings
- Soft/lift as standard for easy operation
- · Available up to 6500 x 2800 mm
- · Narrow sliding frames and frameless side elements
- · Easy operation of sash up to 400 kg sash weight
- · Energy efficient and heating cost saving
- · No tripping hazard due to low threshold height
- · Attractive colours for individual design requests
- · Better stability due to glass fibre low threshold
- Thoughened panes protect from injuries when glass breakages
- Can be perfectly combined with all other Internorm window systems



#### PROPERTIES

\* Thermal insulation U<sub>w</sub> as low as 0.64 W/(m<sup>2</sup>K)

Thermal insulation up to 43 dB

Security RC1N, RC2



# HS 330 timber/aluminium lift-sliding door

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The timber/aluminium lift-sliding door HS 330 makes the borders between inside and outside disappear almost magically. It connects the inside space with the surrounding nature and creates a new, awareness of space.

The HS330 offers unique design and exceptional comfort, combined with high-quality technology:

- · More light through large-scale glazings
- · Available up 11 m wide x 3.2 m height
- · Narrow sliding frame and frameless side elements
- · Easy lifting and sliding of sash up to 400 kg sash weight
- · Energy efficient and heating cost saving
- · Low heat emission due to triple glazing
- · No tripping hazard due to low threshold height
- · Attractive colours for individual design requests
- $\cdot\ \$  Better stability due to glass fibre low threshold
- Thoughened panes protect from injuries
- Can be perfectly combined with all other Internorm window systems





#### **PROPERTIES**

\* Thermal insulation U<sub>w</sub> as low as 0.73 W/(m<sup>2</sup>K)

Thermal insulation up to 40 dB









# HX 300

#### PANORAMA

#### OPEN. BRIGHT. FREE.

Large-scale glazings which can be completely integrated into the brickwork, create unlimited freedom for your home. They bring light to the inside and at the same time offer full view to the outside. Innovative solutions such as glass joints where the transition between the glass panes is virtually invisible, offer many possibilities in the modern, large-scale glass architecture. You can set optical highlights with integrated windows in the style of your house.

#### Enjoy far-reaching views

- · Frameless glass architecture
- · Open bright living environment
- · Create unlimited freedom



Frameless appearance and technologically optimized construction connection

#### **PROPERTIES**

\* Thermal insulation U<sub>w</sub> as low as 0.74 W/(m²K)

9 ((

Thermal insulation

up to 47 dB



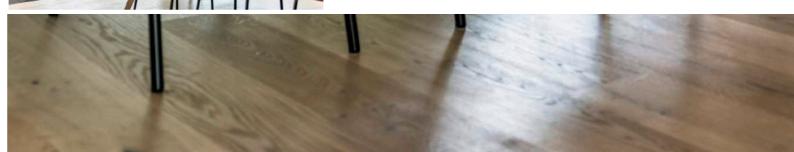




The design of your house is as individual as you are. Let your taste decide on straight-lined, modern, classical or traditional design styles and allow your home to be as individual as you are. By choosing Internorm you can be sure to get the perfect windows for your house style. With almost unlimited design possibilities will we gladly fulfill your exact requirements.

Internorm windows can support the design of your home with a wide range of design styles including:

- Attractive handles in aluminium, chrome and brass
- A multitude of glazing from Satinato to Linea
- Security glazing as well as highly thermally insulating glazing
- · Numerous colours for UPVC, timber and aluminium surfaces
- · Sun and insect protection systems









# PERFECT COMBINATIONS

#### TRUE TO STYLE. INDEPENDENT OF MATERIALS, MATCHING.

The demands on design, energy effciency and comfort of the windows increase with individual architecture. Function and design are no contradiction with Internorm. UPVC/aluminium and timber/aluminium systems can be perfectly combined.

#### Outside same design - choose between UPVC or timber for the inside

If you would rather have a UPVC/aluminium window in the bathroom because of the high humidity, but would not like to miss the timber/aluminium window in the living room, then you can combine these two materials without any problems with Internorm. The design of your window and therefore the exterior design of your house always remains the same. Inside of each room you have the possibility to create your window according to your requirements – either in UPVC or in timber.

Uniform appearance for architecture true to its style No matter in which design style you create your house - if avant-garde, modern, elegant, playful or timeless - Internorm is offering you perfect combinability for each of these styles in the materials UPVC and timber.

#### Can also be combined with lift-sliding doors

You do not have to miss large-scale glazing and more light in your rooms. We are offering you lift-sliding doors in the materials UPVC/aluminium and timber/aluminium, matching the window style.

#### **OUTSIDE - THE SAME**

#### Aluminium

The aluminium clad on the outside adapts to the design style of your house.

#### INSIDE - YOUR CHOICE

#### UPVC

UPVC ist long-lasting, extremely easy to care for and also perfectly suitable for rooms with high humidity such as e.g. the bathroom.



#### Timber conveys warmth, is cozy,

provides a pleasant athmosphere and is therefore perfectly suitable for living rooms and bedrooms..









# SAFE WITH SECURITY

RELIABLE, EFFECTIVE, PATENTED.



#### Security locking elements

All Internorm window systems are equipped with standard security. Solid, attractive, yet discreet designer locking elements in silver together with the hexagonal mushroom shaped closing bolt in



Thanks to Internorm's patented glazing technology, the glass pane cannot be pushed out. The glass pane is glued all around into the window frame and therefore stays securely and tightly. Almost all the window frame lock the window. Internorm window systems are equipped with this I-tec innovation as standard.



#### Concealed hardware

Concealed hardware ensures that windows cannot be levered out of their hinges and serves for discreet protection. When locking the appearance and easy cleaning.



#### I-tec locking

Internorm's revolutionary locking technology guarantees maximum window, flaps open and press on to all sides directly inside the frame. The window cannot be levered any longer.

Optimum security protection and maximum security for children are main requirements to be able to feel at ease within your own four walls. A considerable contribution to this feeling of comfort comes from the windows. You can protect your family effectively with Internorm's sophisticated technologies und make it difficult for intruders to gain access to your house.



#### Security handle

The Secustik handle with safe screening offers highest security. The patented locking mechanism protects absolutely secure against moving the lock from the outside (standard with UPVC and UPVC/ aluminium window KF 500).



#### Lockable handles

Lockable handles offer optimum security for children and perfect burglary protection in one. The window is locked via key or push button and cannot be opened, neither from the outside, nor from the inside.



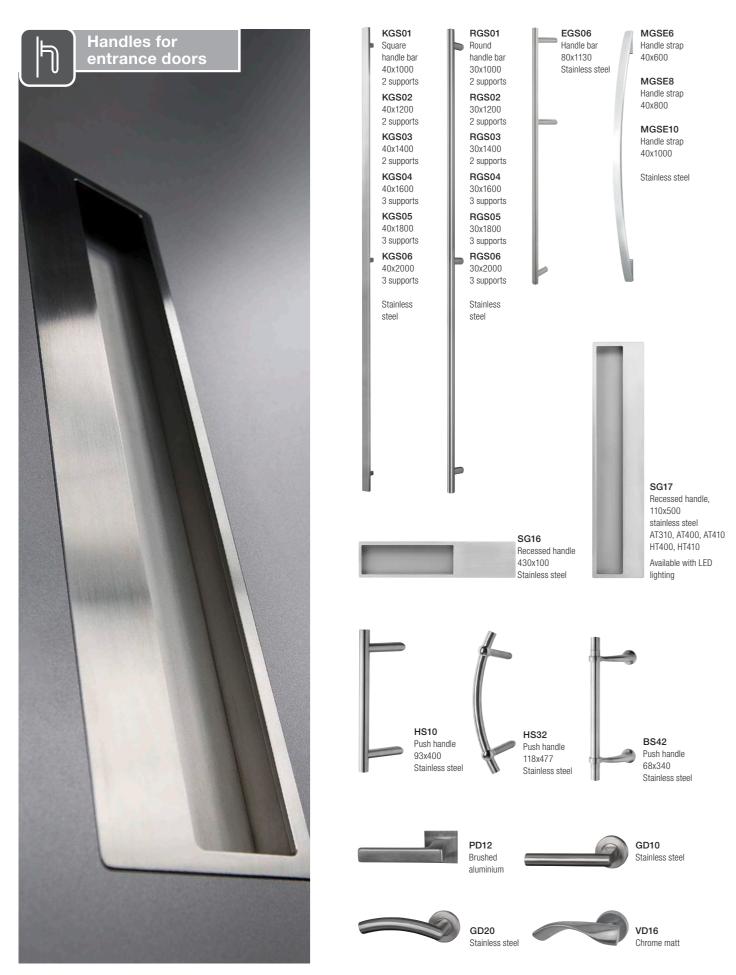
#### Electronic sensor

Locking sensors report reliably and inconspicuously via the I-tec SmartWindow App if and which windows or window doors are open, tilted or locked. The sensor can also be wired upon request and can then be combined with any injury is averted. customary alarm systems.



#### Laminated glass

Contrary to conventional window glass which splinters when broken, laminated glass does not break apart. Tear-resistant foils keep the panes together, the glass stays in the window frame and danger of



Please note that not every handle is available for every door series. More choice and information is available from your Internorm distribution partner.





Handle G80

Handle Dallas

Handle Softline

## GLASS



Satinato white



Satinato green (only for Doors)



Satinato blue (only for Doors)







There is a comprehensive selection of glass available matching the respective window and door series in the different design styles.

Variable glass cut-outs are available upon request and after technical inspection.

Please note that not every glass is available for every door series. Due to printing and manufacturing technology colour and structure deviations between illustrations in this brochure and original products may occur.

Your Internorm [1st] window partner / distribution partner will gladly show you original colour samples.





Old German K



Reflo



Masterpoint



Wire glass



Mastercarré



Ornament 504

## EXTERNAL SIDE OF WINDOWS AND DOORS

#### SD COLOURS (ONLY FOR DOORS)













\*Available on technical

#### **UPVC**



Please note that not every colour is available for every window and door. Due to printing and manufacturing technology colour deviations between illustrations in this brochure and original products may occur.

Your Internorm [1st] window partner / distribution partner will gladly show you original colour

#### ALUMINIUM ATTACHMENT CLAD

#### STANDARD COLOURS\*





#### hirest-COLOURS\*\*\*



#### **NEW: DURAxal COLOURS**



#### SPECIAL COLOURS

A variety of design possibilities are offered by the Internorm RAL colour range (facade quality). These are the colours available for aluminium attachment clads outside and timber inside.

- \* Highly weather-resistant, except M916 (facade quality).
- \*\* Intensive colour appearance, however colour tolerances possible.
- \*\*\* A special highly weather-resistant powder coating is used for surface versions HM (highly weatherresistant standard colour), HF (highly weather-resistant fine structure), HFM (highly weather-resistant fine structure metallic), and HDH (highly weather-resistant timber decor colour).
- \*\*\*\* HDH colours have a vibrant timber appearance being hand-finished with structure coating, however colour tolerances are possible.

#### HDS COLOURS\*\*



#### TIMBER DECOR COLOURS\*\*\*\*



#### METALLIC DECOR COLOURS



#### STAINLESS STEEL COLOURS





## INTERNAL VIEW OF WINDOW

#### **UPVC**



#### **DECOR FOILS**



- \* Available for KF 500, KF 410 and KV 440 in studio and home pure as well as KF 310 and KV 350 in all available design styles
- \*\* Available for KF 410, KF 200 and KV 440 in home soft and ambiente as well as KF 310 and KV 350 in all available design styles
- \*\*\* Only for KS 430, KF 310 and KV 350

#### TIMBER

#### STANDARD COLOUR SPRUCE, VARNISHED



STANDARD COLOUR SPRUCE, OPAQUE



STANDARD COLOUR LARCH, VARNISHED





COLOURS HF 410 – additionally available to timber standard colours

NEW: Also available different types of timber for windows can be used for timber/aluminium window HF 410 and timber/aluminium lift-sliding door HS 330.

El 703, El 704 and LA 603 not available for HS 330.

\* Brushed



# GLAZING

#### TOUGHENED AND INSULATING GLASS

All insulating and toughened glass which is fitted into Internorm products comes from in-house production. We are independently promoting progress and aiming to satisfy the trend for innovative and highly thermally insulating glass solutions.

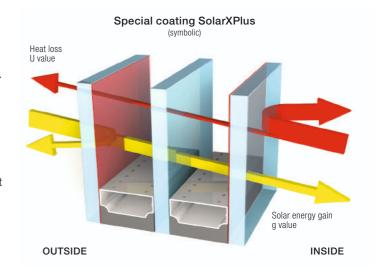
even more daylight – a key benefit especially in the Winter months.

#### Thermal insulation glazing

Extremely thin precious metal coatings and precious gases such as argon or krypton are used in the cavity between the panes and ensure perfect thermal insulation. Choose triple thermal insulation glazing instead of double glazing and you can plan up to 40 % more glazing areas with the same heating costs.

#### SolarXPlus

The new type of coating of the glass panes lets more light and energy into your interior than other special glazing. This renders your living spaces even more appealing and lighter, it also offers excellent thermal insulation. The heat loss is therefore minimal and you can enjoy











# SUN AND INSECT PROTECTION

#### COMBINABLE. INTEGRATED. MANY VARIATIONS.

The sun and insect protection systems complement the windows to a functional unit and support the design of the house facade. Combine your sun protection products with I-tec SmartWindow and enjoy the comfort of automatic functions as well as the convenient control via Smartphone or tablet.

**Windows with integrated blinds:** Integrated sun and privacy protection between the panes – choose between blinds, Venetian blinds or Duette® blinds, upon request with energy self-sufficient shading (I-tec shading).

**Venetian blinds:** Optimum control and guidance of light and warmth through adjustable slats, upon request with day light guidance RETROLux. Can be combined with insect protection.

**Attachment Venetian blinds:** Optimum control and guidance of light and warmth through adjustable slats. Can be combined with insect protection.

**Exposed and mini exposed roller shutters:** Delivered separately or completely fitted on to the window. Can be combined with insect protection.

Insect protection: Fixed, turn, sliding or pull-down flyscreen. Can be combined with sun protection.

Window shutters: Made of aluminium, with many design possibilities. Can be combined with insect protection.

























# SIDE ENTRANCE DOORS

Side entrance doors serve to close off unused, unheated rooms (e.g. garage, basement storage rooms etc.). Current statistics show that intruders predominantly gain access to a house via side entrances. It is therefore all the more important to consider relevant security features - Internorm offers different security systems upon request.

Side entrance doors are available in, timber/aluminium, aluminium and UPVC and offer a wide range of individual design possibilities.















# THERMAL INSULATION

#### ENERGY EFFICIENT, WELCOMING, WARM,

Highly thermally insulating window systems ensure comfort and warmth within your own four walls. In connection with a special coating for using solar radiation they virtually becomes free additional heating.

As a building can lose approximately 25 to 30 % of its energy through the windows, the thermal insulation of the windows is especially important. Through careful planning, correct positioning of the window areas (large window areas south-facing) can positively influence the energy balance of the building. The thermal insulation of the window depends on the frame material, the insulating glass and the tightness of the window. The **parameter for the insulating capability** of the window is the **U value. The lower the value, the better the thermal insulation.** Additional features such as roller shutters and window shutters can improve the U value.





# SOUND REDUCTION

#### CALM. COMFORTABLE. QUIET.

Interference of noise is unpleasant and can, given the right intensity and duration, affect the human body in a negative way. Noise is perceived through the human ear and passed on to the brain.

Sound reduction of a window is measured in decibels. The higher the value, the better the sound reduction. Sound reduction states how much sound energy from the original sound energy is allowed to pass through. At an insulation of 10 dB 1/10 of the original sound energy passes through, at 20 dB 1/100, at 30 dB 1/1000 etc. Humans perceive a reduction of 10 dB as halving the noise. Sound reduction of a window is dependent on frame material, insulating glass, tightness of the window and the construction connection.



## WARRANTIES

# WE GUARANTEE YOU MANY YEARS OF PLEASURE WITH YOUR INTERNORM WINDOWS.

As Europe's leading and largest active international window brand, Internorm looks back on 87 years of experience in trendsetting window and door solutions of exceptional reliability and longevity. This, we can guarantee you.

#### Warranty



- No unnatural colour changes or cracked surfaces due to weather influences for white window and door profiles made of UPVC, with the exception of mitre cracks.
- No unnatural colour changes or cracked inside surfaces due to weather influences for foil-coated window and door profiles made of UPVC, with the exception of mitre cracks.
- No unnatural colour changes or cracked surfaces due to weather influences for anodised or powder coated window and door profiles made of aluminium.
- · No condensation between the panes of insulating glass.
- The function of the timber, thermal foam and aluminium profile compounds is guaranteed for all Internorm timber/aluminium window systems, provided that the Internorm installation and maintenance guidelines have been adhered to.
- The function of the adhesive and the sealing of insulation glass panes with the window profiles is guaranteed for all Internorm timber/aluminium window systems, provided that the Internorm installation and maintenance guidelines have been adhered to.
- · The glue connection of glued Georgian/feature bars.

#### Warranty



- PVD coated door handles are guaranteed against corrosion if there is no mechanical change.
- No unnatural colour changes or surface cracks due to weather influences in door fllings. There is no guarantee for changes in the surface appearance as a result of dirt.

#### Warranty



- No unnatural colour changes or surface cracks due to weather influences for roller shutter profiles made of UPVC.
- No unnatural colour changes or surface cracks due to weather influences for anodised or powder coated roller shutter and blind profles made of aluminium.
- The function of the window or door fitting is guaranteed, provided that the Internorm installation and maintenance guidelines have been adhered to.

#### WARRANTIES/EXCERPT:

The full wording of our warranty conditions, the exact preconditions for the application of the warranty, and what you should do in the event of a claim, can be found in the Internorm Maintenance Care and Warranties Manual. You will receive this booklet when your Internorm products are delivered. In addition, it is obtainable from any Internorm [1<sup>st</sup>] window partner / distribution partner.

# NATIONAL AND INTERNATIONAL CERTIFICATIONS CONFIRM THE HIGH QUALITY OF OUR PRODUCTS.

Our know-how gives you the security that you receive best service for your money. The most modern production facilities and strictest quality controls ensure quality which is setting standards all over Europe. Awards of independent test institutes from all over Europe are confirming this.



Austrian State Emblem



Austrian Quality Label



CE Certification



Institute for Window Technology Rosenheim



Plus X A











Federal Ministry for Traffic, Innovation and Technology



Minergie® Certificate



Austrian Society for Environment Simulation



Certificate for Sustainable Forest Management



KlimaHaus Certificate



Energy Globe (Projekt Schiestlhaus



Technical University

Climate Association Town Traun



VinylPlus Certificate

#### Secured by Design









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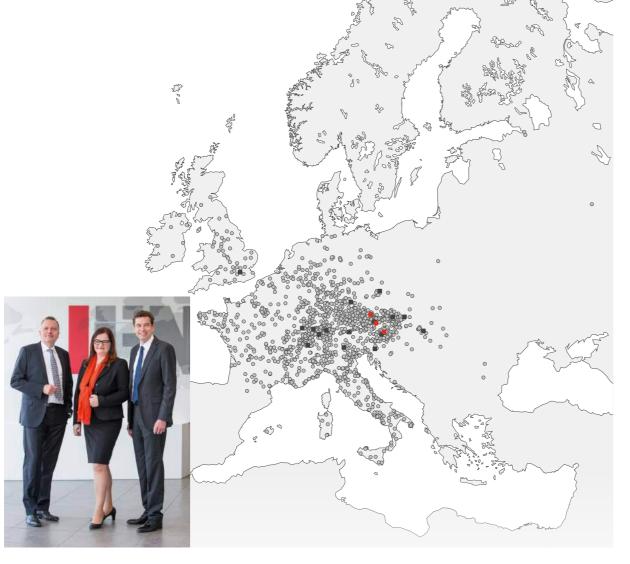
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# EUROPE'S NO. 1 WINDOW BRAND

#### WE ARE A STRONG FAMILY BUSINESS!

Internorm has been a family business for 88 years having developed from a one-man blacksmith's shop to the largest internationally active window brand.

During this time we have manufactured over 25 million window and door units, all 100% made in our production facilities in Traun, Sarleinsbach and Lannach. From the creation of the UPVC window and the production of the timber/aluminium window to today's high tech and ultra-modern design innovations, our family company has been setting standards all over Europe. We are pioneers in our field and continue to further develop technology and innovative ideas.

Our staff, of over 1850 employees across Europe, are specialists who thrive on attention to detail and act with passion and integrity. Together with more than 1300 distribution partners in 21 countries we guarantee perfect product quality and the highest levels of service.

- Internorm manufacturing sites (production exclusively in Austria)
- Internorm offices
- Internorm distribution partners

NOTES

NOTES

# Internorm

#### **HEAD OFFICE**

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