

# STVS MODULAR

Professional on modular handrail, fence and  
gate systems

# ABOUT STVS MODULAR

**STVS Modular is Vietnam leading manufacturing of innovative modular handrail, Modular railing fence and Gate systems.**

*At STVS Modular, we do things differently! We're always on the lookout for better ways to solve the unique obstacles construction projects face, so that our customers can focus on doing what they do best.*

**Our various range of handrails, guardrail** systems for commercial and industry are specifically designed for a wide range of industrial, commercial and civil applications. All our modular handrail systems comply with OSHA standard or TCVN standard, so you know you're always covered.

Our range of proprietary modular designs are manufactured in house and designed to save our customers time and money, and our personalised approach to customer service ensures you're looked after from concept to installation. Our barrier systems are fit for purpose, simple to use, and able to be modified to cater for any unique requirements, and our streamlined ordering and installation process is designed with customer convenience in mind.



**The sliding gate and swing gate** boasts the latest technology and such smooth and stable operation. Our know-how about coating and connection technology give beautiful finishing and high corrosion resistant ability for products. This give a great quality and good looking for the products in long term.

**The Modular railing fence** system with elegant design for high profile locations, Easily combined with entrance gates and detection systems. Secure and suitable for all terrains. Moisture and dirt resistant surfaces. This attractive fence is ideal for office buildings, schools, and other high-visibility location

**From initial design to final quality assurance processes, we make sure our goods are reliable and exceptional.**





# PRODUCTS RANGE

## Sliding gate



## Swing gate



## Fall protect systems



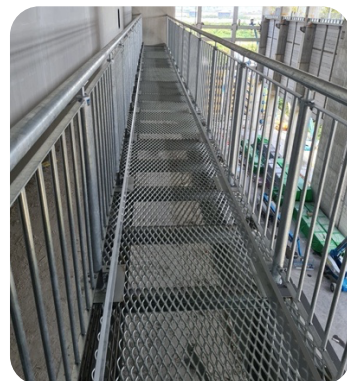
## Bollards





# PRODUCTS RANGE

## Modular handrail



## Modular Balustrade



## Modular fencing

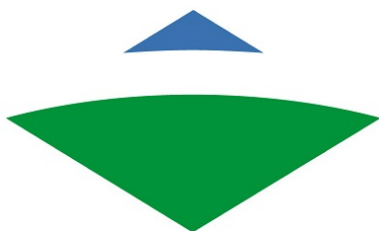




## OUR CUSTOMER



M A E D A



O B A Y A S H I



# COATING PROCESS

## POWDER COATING

Application for **modular handrail, fencing, balustade, clamp fitting**



Increase corrosion resistant ability with primer layer can apply as optional.

**E-dip coating** can be applied as additional option for **modular balustrade** to achieve incredible anti-corrosion quality with 10 years anti corrosion warranty up to C4 environment condition (according to ISO 12944-2)

## PU COATING

Application for **Gate products.**



STVS Modular PU paint system use high quality Marine PU paint from American maker give excellent quality and finishing appearance of products

STVS modular PU paint process are high strictly. The material be dipped into Acid and water tank to make sure all oil and dust are clear before paint.

PU coating applied on hot dip galvanized give excellent anti-corrosion quality with 10 years anti corrosion warranty up to C5 environment condition (according to ISO 12944-2)

## HOT DIP GALVANIZED

Application for all products: **Fence, gate, handrail and balustrade, clamp fitting**

STVS Modular use hot dip galvanized system according to ASTM A123

Our know-how about the way to have good air run when hot dip galvanized give a very smooth and beautiful finishing for fence and balustrade products. This give a great quality and good looking for the products.

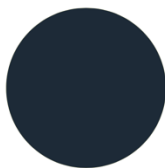


# COLOR

## Standard color for fence and balustrade and Gate



RAL6005



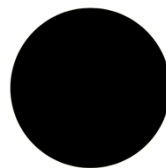
RAL7016



RAL7035



RAL7005



RAL9005



RAL9010

## Standard color for modular handrail



RAL1023

## Other color available upon request





# MODULAR HANDRAIL SYSTEM

## KEY FEATURES

Unlike traditionally welded alternatives, STVS modular proprietary modular designs eliminate design and engineering costs and onsite fabrication issues while reducing installation costs.

Supplied as a series of clamp components with simple assembly instructions, every STVS modular system can be adapted or extended with additional components, or cut to size on-site.

Pre-engineered to minimise the cost of maintenance and repairs, damaged components are easily replaced with spare parts

Compact packing give low transportation cost

Because no hot works permits are required and no toxic galvanisation fumes are generated, fire spotters are not needed during installation

Handrails, balustrades and guardrails can be installed by non-specialist trades while ensuring structural integrity and compliant installation

No touch up painting required

Delivered in ready to assemble, kit form packaging

All systems designed for modular assembly and rapid, streamlined onsite installation

Reducing opportunities for corrosion



# APPLICATION

Water treatment tank



Walk way handrail



Mezzanine handrail





## Staircase handrail



## Public guardrail



## Fall protection





# PRODUCT SPECIFICATION

## DIMENSION:

<b>Handrail height:</b>	1100mm for straight handrail 900-1000mm for staircase handrail
<b>Post distant:</b>	Max 1500mm
<b>Post section:</b>	D42.2 mm
<b>Top horizontal bar section:</b>	D42.2 mm / D48.1mm
<b>Middle horizontal bar section:</b>	D42.2 mm
<b>Flange:</b>	150x75x8mm for straight handrail 180x75x8mm for staircase handrail 120x120x8mm as optional

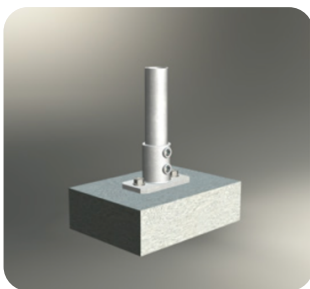
## MATERIAL:

<b>Tube:</b>	Steel tube according to BS standard
<b>Clamp fitting:</b>	Malleable iron
<b>Set screw:</b>	Low carbon C1008/1010 steel, case-harden

## FINISHING:

<b>Tube:</b>	<b>G0:</b> Mild steel <b>G1:</b> Galvanized Z80 <b>G2:</b> Hot dip galvanized
<b>Clamp fitting:</b>	Hot dip galvanized according to ASTM A 123 Powder coating paint
<b>Set screw:</b>	GEOMET 500B

## CONNECT METHOD:



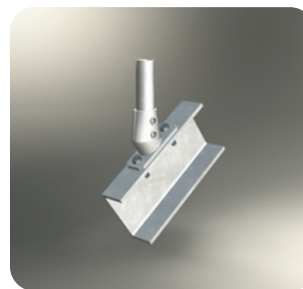
### **TOP MOUNT (TM)**

On steel: Bolt set  
hi-tensile M14  
On concrete:  
Expansion anchor  
bolt M12-100



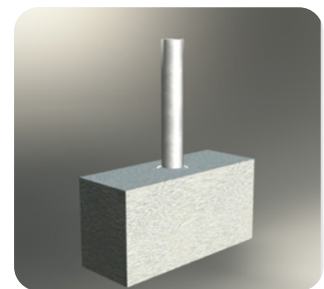
### **SIDE MOUNT (SM)**

On steel: Bolt set  
hi-tensile M14



### **ANGLE MOUNT (AM)**

On steel: Bolt set  
hi-tensile M14



### **BURIED INTO CONCRETE**

Embed 200mm  
into concrete



**STVS MODULAR**

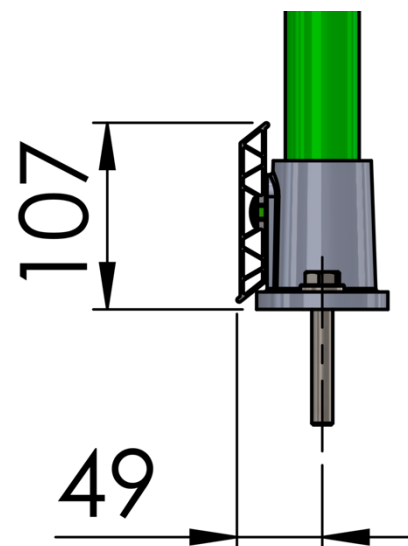
## ®BANNANA STEM TOE PLATE SYSTEM

STVS unique aluminum toeplate design. This design follow BS-EN ISO 14122 standard.

Extract: 7.1.7 A toe-plate with a minimum up stand of 100 mm shall be placed 10 mm maximum from the walking level and the edge of the platform.

The idea from banana stem structure give super strong toeplate also allows quick and easy installation. No drilling or welding, the structure allows for secure attachment with no exposed fasteners. Banana stem structure provides rigid non-buckling performance with the benefit of light weight, easy handling

The toeplate with aluminum with many option of powder coating paint finishing give high quality performance of appearance and corrosion resistant.







## Focus PULL 200 Kg into middle of top rail

### STVS process strength testing for handrail at SGS vietnam

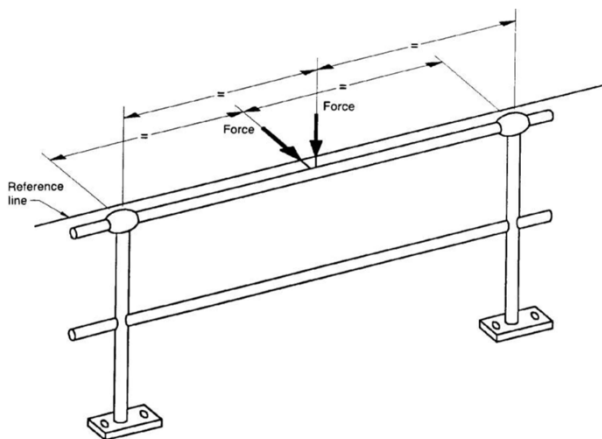


FIGURE C1 TYPICAL GUARDRAIL TEST

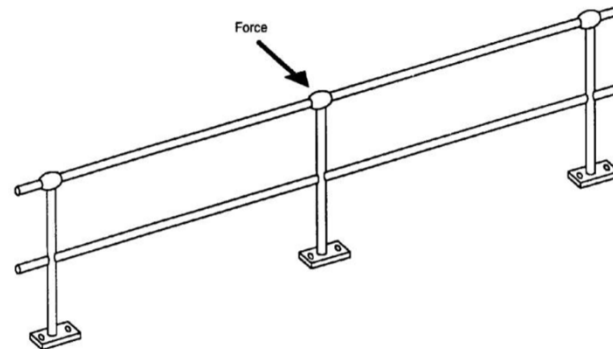


FIGURE B1 TYPICAL GUARDRAIL POST TEST

#### The result:

Handrail shape change less than 15mm

Handrail no change shape after testing

The result excess AZ 1657, OSHA or ISO 14122-3 standard requirement



## Test Report

No. VNHL1907012485HG

Date: August 23, 2019

Page 1 of 6

### STVS CO., LTD

37 HOA MAI, WARD 2, PHU NHUAN DISTRICT, HO CHI MINH CITY, VIETNAM

The following sample(s) was/were submitted and identified by the client as:

SGS Job No. : VNHL1907012485HG

Sample Description : ASSEMBLY HANDRAIL "(LAN CAN LAP RAP)"

Color : "MA KEM" (GALVANIZED)

Characteristic : "THEP MA KEM NHUNG NONG"

Style / Item No. : CP32HB3P0G0

Date of Production : 06/2019

Manufacturer : STVS CO., LTD

Buyer : STVS CO., LTD

Country of Origin : VIET NAM

Country of Destination : WORLD WIDE

Other Information : ASSEMBLY HANDRAIL  
PIPE DIMENSION: 42.2x3.2mm  
POST CENTRE DISTANT: 1500mm  
HEIGHT: 1050mm  
HORIZONTAL BARS QUANTITY: 2 BARS  
ANCHOR BOLT: M12-100  
FINISHING: HOT DIP GALVANIZED  
MANUFACTURE: STVS CO., LTD

Sample Receiving Date : JULY 29, 2019

Final confirmed Date : JULY 29, 2019

Testing Period : JULY 29, 2019 TO AUGUST 05, 2019

Test Requested : SELECTED TEST (S) AS REQUESTED BY CLIENT.

Test Results : PLEASE REFER TO NEXT PAGE(S).

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Lab: Lot III/21, 19/5A St, Industrial Group III, Tan Binh IZ, Tan Phu District, HCMC, S.R. Vietnam t (84-28) 3816 0999 f (84-28) 3816 0996

Member of the SGS Group (SGS SA)



M O D U L A R

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## Test Report

No. VNHL1907012485HG

Date: August 23, 2019

Page 2 of 6

Signed for and on behalf of  
**SGS Vietnam LTD**



**Wong Cho Wing**  
Hardline and E&E Lab Manager

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# PRODUCT SUMMARY

## HEAVY STRAIGHT HANDRAIL

Type	Post section	Horizontal bars section	Horizontal bars quantity	Finishing	Mount type	Code
T4	D42.2x3.2	D42.2x3.2	2	Paint	Top Mount (TM)	T4-CP32-32HB2G0-TM
T4	D42.2x3.2	D42.2x3.2	2	Hot dip galvanized	Top Mount (TM)	T4-CP32-32HB2G2-TM
T4	D42.2x3.2	D42.2x3.2	2	Paint	Side Mount (SM)	T4-CP32-32HB2G0-SM
T4	D42.2x3.2	D42.2x3.2	2	Hot dip galvanized	Side Mount (SM)	T4-CP32-32HB2G2-SM
T4	D42.2x3.2	D42.2x3.2	3	Paint	Top Mount (TM)	T4-CP32-32HB3G0-TM
T4	D42.2x3.2	D42.2x3.2	3	Hot dip galvanized	Top Mount (TM)	T4-CP32-32HB3G2-TM
T4	D42.2x3.2	D42.2x3.2	3	Paint	Side Mount (SM)	T4-CP32-32HB3G0-SM
T4	D42.2x3.2	D42.2x3.2	3	Hot dip galvanized	Side Mount (SM)	T4-CP32-32HB3G2-SM

## HEAVY STAIRCASE HANDRAIL

Type	Post section	Horizontal bars section	Horizontal bars quantity	Finishing	Mount type	Code
T5	D42.2x3.2	D42.2x3.2	2	Paint	Angle Mount (AM)	T5-CP32-32HB2G0-AM
T5	D42.2x3.2	D42.2x3.2	2	Hot dip galvanized	Angle Mount (AM)	T5-CP32-32HB2G2-AM
T5	D42.2x3.2	D42.2x3.2	3	Paint	Angle Mount (AM)	T5-CP32-32HB3G0-AM
T5	D42.2x3.2	D42.2x3.2	3	Hot dip galvanized	Angle Mount (AM)	T5-CP32-32HB3G2-AM



## MEDIUM STRAIGHT HANDRAIL

Type	Post section	Horizontal bars section	Horizontal bars quantity	Finishing	Mount type	Code
T4	D42.2x2.5	D42.2x2.0	2	Paint	Top Mount (TM)	T4-CP25-20HB2G0-TM
T4	D42.2x2.5	D42.2x2.0	2	Hot dip galvanized	Top Mount (TM)	T4-CP25-20HB2G2-TM
T4	D42.2x2.5	D42.2x2.0	2	Paint	Side Mount (SM)	T4-CP25-20HB2G0-SM
T4	D42.2x2.5	D42.2x2.0	2	Hot dip galvanized	Side Mount (SM)	T4-CP25-20HB3G2-SM
T4	D42.2x2.5	D42.2x2.0	3	Paint	Top Mount (TM)	T4-CP25-20HB3G0-TM
T4	D42.2x2.5	D42.2x2.0	3	Hot dip galvanized	Top Mount (TM)	T4-CP25-20HB3G2-TM
T4	D42.2x2.5	D42.2x2.0	3	Paint	Side Mount (SM)	T4-CP25-20HB3G0-SM
T4	D42.2x2.5	D42.2x2.0	3	Hot dip galvanized	Side Mount (SM)	T4-CP25-20HB3G2-SM

## MEDIUM STAIRCASE HANDRAIL

Type	Post section	Horizontal bars section	Horizontal bars quantity	Finishing	Mount type	Code
T5	D42.2x2.5	D42.2x2.0	2	Paint	Angle Mount (AM)	T5-CP25-20HB2G0-AM
T5	D42.2x2.5	D42.2x2.0	2	Hot dip galvanized	Angle Mount (AM)	T5-CP25-20HB2G2-AM
T5	D42.2x2.5	D42.2x2.0	3	Paint	Angle Mount (AM)	T5-CP25-20HB3G0-AM
T5	D42.2x2.5	D42.2x2.0	3	Hot dip galvanized	Angle Mount (AM)	T5-CP25-20HB3G2-AM



# ASTRAEUS HANDRAIL

## KEY FEATURES:

### Application:



**Design:** Strong and elegance design with nice and high gloss finshing.

The round vertical bars Ø26 give smooth looking and strong structure.

Very strong with horizontal bar thickness up to 2.5mm and vertical bar 1.5mm thickness.

Using hidden connection. No damage the finishing coating in installation progress, nice appearance. The life cycle of fence does not effected by accessories. Impossible to remove the panel once installed.

### Easy & quick installation:

Easy angle management due to the linking systems. Applicable for all types of configurarions: Curves, Corners, Slopes, on walls... with the same standard products.

The connection made by SUS304 give long last quality.





## PAINT FINISH:

### PANEL:

<b>Material:</b>	Steel according to ASTM A53 standard
<b>Panel height:</b>	1100
<b>Panel width:</b>	1140
<b>Horizontal bars section:</b>	50x25x1.5mm
<b>Horizontal bars quantity:</b>	3
<b>Vertical bars section:</b>	Ø26 mmx1.2mm
<b>Vertical bars distant:</b>	Max 100mm
<b>Surface treatment:</b>	Galvanized Z80

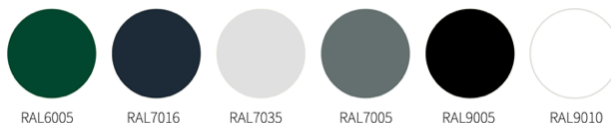
### POST:

<b>Material:</b>	Steel
<b>Post distant:</b>	1200mm
<b>Post section:</b>	Square tube 60x60x2.0mm
<b>Post length:</b>	1100mm
<b>Post cap:</b>	Black PE plastic
<b>Flange:</b>	120x120x6mm
<b>Anchor bolt (if need):</b>	M12-100 or M14x40 (hot dip galvanized finish)
<b>Connect method:</b>	Stainless steel 304 hidden inner connection
<b>Surface treatment:</b>	Galvanized Z80

**Finishing:**

**Color:**

Polyester powder coating paint, paint thickness 100-120 micromet.



6 economic and standard color.

Other colours available upon request.

**Warranty:**

3 years anti-corrosion up to C3, 2 years up to C4.

10 years anti-corrosion up to C4 for E coating plus option.

The anti-corrosion guarantee only covers rust-related faults. It is based on the European standard ISO 12944, which defines precise corrosivity categories.

## HOT DIP GALVANIZED FINISH:

Our know-how about the way to have good air run when hot dip galvanized give a very smooth and beautiful finishing for fence and balustrade products. This give a great quality and good looking for the products.

**PANEL:**

**Material:**

Steel according to ASTM A53 standard

**Panel height:**

1100

**Panel width:**

1140

**Horizontal bars section:**

50x25x1.5mm

**Horizontal bars quantity:**

3

**Vertical bars section:**

Ø26 mmx1.5mm

**Vertical bars distant:**

Max 100mm

**Surface treatment:**

Black steel

**POST:**

**Material:**

Steel

**Post distant:**

1000mm

**Post section:**

Square tube 60x60x2.0mm

**Post length:**

1100mm

**Post cap:**

Black PE plastic

**Flange:**

120x120x8mm

**Anchor bolt (if need):**

M12-100 (hot dip galvanized finish)

**Connect method:**

Stainless steel 304 hidden inner connection

**Surface treatment:**

Black steel

**Finishing:**

Hot dip galvanized.

**Warranty:**

10 years anti-corrosion up to C4, 5 years up to C5M. The anti-corrosion guarantee only covers rust-related faults. It is based on the European standard ISO 12944, which defines precise corrosivity categories.



## INSTALLATION:

- STVS Modular 304 hidden inner connection give long-last quality connection.
- Easy angle management due to the linking systems.
- Applicable for all types of configurarions: Curves, Corners, Slopes, on walls... with the same standard products.

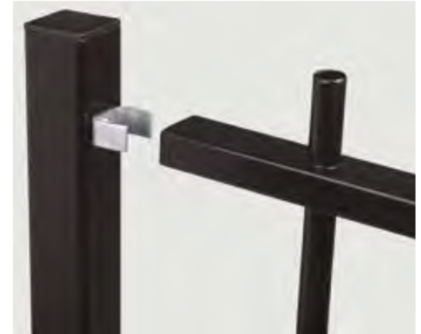
### Principal:



*Round or square end cap  
(depending on the post)*

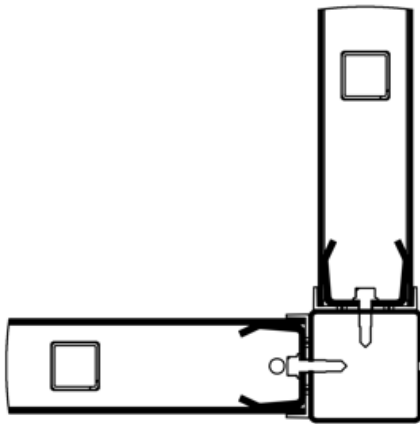


*Screw-on "U" piece*

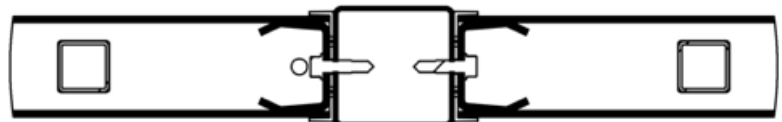


*Slotted railings*

### Angle management:



*90° angle*



*180° angle*



# ASTRA RAILING FENCE

## Application:



**Design:** Strong and elegance design with nice and luxury finishing, level up site appearance.

The round vertical bars Ø26 give smooth looking and strong structure.

Using hidden connection. No damage the finishing coating in installation progress, nice appearance. The life cycle of fence does not effected by accessories. Impossible to remove the panel once installed.

## Easy & quick installation:

Easy angle management due to the linking systems. Applicable for all types of configurations: Curves, Corners, Slopes, on walls... with the same standard products.

Applicable to all type of soil: Rock and Sand...Etc

- **Elegant design for high profile locations**
- **Easily combined with entrance gates and detection systems**
- **Secure and suitable for all terrains**
- **Moisture and dirt resistant surfaces**
- **This attractive fence is ideal for office buildings, schools, and other high-visibility location**

# PAINTING FINISH

## PANEL:

<b>Material:</b>	Steel according to ASTM A53 standard
<b>Panel height:</b>	500-1800mm
<b>Panel width:</b>	2940
<b>Horizontal bars section:</b>	50x25x1.5mm
<b>Horizontal bars quantity:</b>	2/3
<b>Vertical bars section:</b>	Ø26 mmx1.2mm
<b>Vertical bars distant:</b>	110 or 130mm

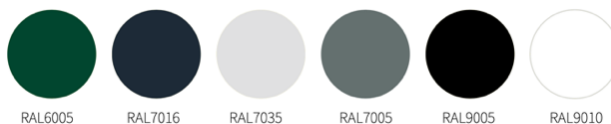
## POST:

<b>Material:</b>	Steel
<b>Post distant:</b>	3000mm
<b>Post section:</b>	Square tube 60x60x2mm
<b>Post length:</b>	1000-2800mm
<b>Post cap:</b>	Black PE plastic
<b>Flange (if need):</b>	150x150x5mm
<b>Anchor bolt (if need):</b>	M12-100 (hot dip galvanized finish)

## SPIKE:



<b>Connect method:</b>	Stainless steel 304 hidden inner connection
<b>Surface treatment:</b>	Galvanized Z120
<b>Finishing:</b>	Polyester powder coating paint, paint thickness 100-120 micromet.
<b>Color:</b>	



6 economic and standard color.

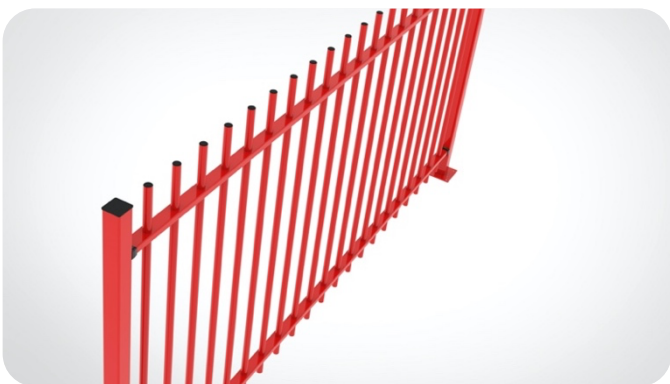
Other colours available upon request.

<b>Warranty:</b>	3 years anti-corrosion up to C3, 2 years up to C4.
------------------	--





- ❖ TWO & THREE HORIZONTAL BARS OPTIONS
- ❖ OVER STANDING AND NON OVER STANDING OPTION
- ❖ PAINTING OR HOT DIP GALVANIZED FINISHING



# INSTALLATION:

- STVS Modular 304 hidden inner connection give long-last quality connection.
- Easy angle management due to the linking systems.
- Applicable for all types of configurarions: Curves, Corners, Slopes, on walls... with the same standard products.
- Applicable to all type of soil: Rock and Sand...Etc

## Principal:



Round or square end cap  
(depending on the post)

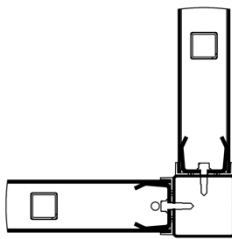


Screw-on "U" piece

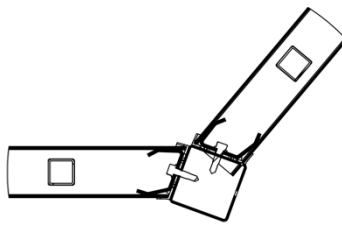


Slotted railings

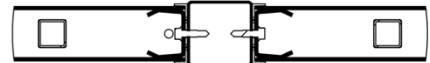
## Angle management:



90° angle

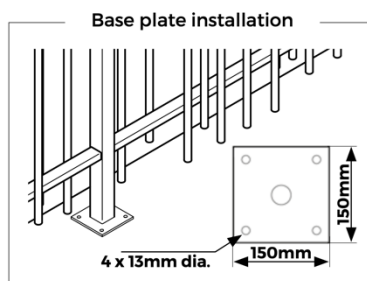
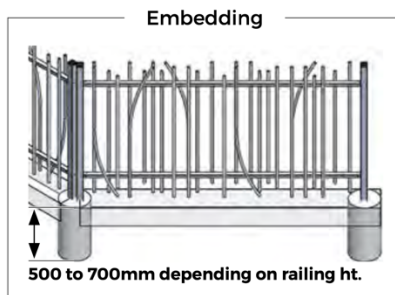


Maximum 130° angle



180° angle

## Installation configuration:



## PRODUCT CODE SUMMARY

### Panel:

(Unit:mm)

TYPE	PANEL WIDTH	PANEL HEIGHT	HORIZONTAL BARS QTY	VERTICAL BARS DISTANT	TOP BARS
PA21 1500	2940	1420	2	110	Flat/Spike
PA31 1500	2940	1420	3	110	Flat/Spike
PA21 1800	2940	1720	2	110	Flat/Spike
PA31 1800	2940	1720	3	110	Flat/Spike
PB21 1500	2940	1420	2	110	Flat/Spike
PB31 1500	2940	1420	3	110	Flat/Spike
PB21 1800	2940	1720	2	110	Flat/Spike
PB31 1800	2940	1720	3	110	Flat/Spike
PA22 1500	2940	1420	2	130	Flat/Spike
PA32 1500	2940	1420	3	130	Flat/Spike
PA22 1800	2940	1720	2	130	Flat/Spike
PA32 1800	2940	1720	3	130	Flat/Spike
PB22 1500	2940	1420	2	130	Flat/Spike
PB32 1500	2940	1420	3	130	Flat/Spike
PB22 1800	2940	1720	2	130	Flat/Spike
PB32 1800	2940	1720	3	130	Flat/Spike



**Post:**

TYPE	POST LENGTH	PANEL HEIGHT	HORIZONTAL BARS QTY	FLANGE
SPP2 1950	1950	1420	2	No
SPP3 1950	1950	1420	3	No
SPP2 2300	2300	1720	2	No
SPP3 2300	2300	1720	3	No

*Other dimension available upon request*

**FINISHING:**

P: Paint finish

G: Hot dip galvanized finish

**FENCE TYPE**

A: Non-Overstanding

B: Overstanding

**VERTICAL BAR DISTANT**

2: 110mm

3: 130mm

**HORIZONTAL BARS QUANTITY**

2: 2 bars

3: 3 bars

**FENCE HEIGHT**

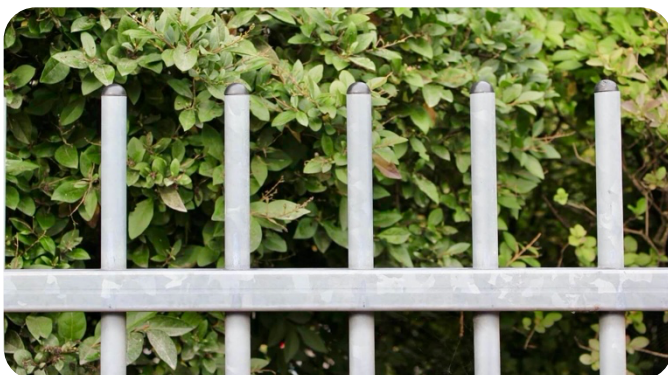
Panel height = Fence height – 80m



## HOT DIP GALVANIZED FINISHING

- Elegant design
- Very strong with horizontal bar thickness up to 2mm and vertical bar 1.5mm thickness.
- Economic solution for fence when install directly into the ground
- Our know-how about the way to have good air run when hot dip galvanized give a very smooth and beautiful finishing for fence and balustrade products. This give a great quality and good looking for the products.
- Lowest cost solution in long term, no any maintenance cost needed with 10 years anti corrosion warranty up to C5 environment according to ISO 12944-2.

### OVER STANDING AND NON-OVERSTANDING:







## TECHNICAL SPECIFICATION – HDG FINISH

### **PANEL:**

<b>Material:</b>	Steel according to ASTM A53 standard
<b>Panel height:</b>	500-2300mm
<b>Panel width:</b>	2940
<b>Horizontal bars section:</b>	50x25x1.5mm
<b>Horizontal bars quantity:</b>	2/3
<b>Vertical bars section:</b>	Ø26 mmx1.5mm
<b>Vertical bars distant:</b>	110 or 130mm

### **POST:**

<b>Material:</b>	Steel
<b>Post distant:</b>	3000mm
<b>Post section:</b>	60x60x2mm
<b>Post length:</b>	1000-2800mm
<b>Post cap:</b>	Black PE plastic
<b>Flange (if need):</b>	150x150x5mm
<b>Anchor bolt (if need):</b>	M12-100 (hot dip galvanized finish)
<b>Connect method:</b>	Stainless steel 304 hidden inner connection
<b>Surface treatment:</b>	Black steel
<b>Finishing:</b>	Hot dip galvanized according to ASTM A123 standard.
<b>Warranty:</b>	10 years anti-corrosion up to C4, 5 years up to C5



## PRODUCT CODE

### PANEL:

(Unit:mm)

TYPE	PANEL WIDTH	PANEL HEIGHT	HORIZONTAL BARS QTY	VERTICAL BARS DISTANT	TOP BARS
<b>GA21 1500</b>	2940	1420	2	110	Flat/Spike
<b>GA31 1500</b>	2940	1420	3	110	Flat/Spike
<b>GA21 2000</b>	2940	1920	2	110	Flat/Spike
<b>GA31 2000</b>	2940	1920	3	110	Flat/Spike
<b>GB21 1500</b>	2940	1420	2	110	Flat/Spike
<b>GB31 1500</b>	2940	1420	3	110	Flat/Spike
<b>GB21 2000</b>	2940	1920	2	110	Flat/Spike
<b>GB31 2000</b>	2940	1920	3	110	Flat/Spike
<b>GA22 1500</b>	2940	1420	2	130	Flat/Spike
<b>GA32 1500</b>	2940	1420	3	130	Flat/Spike
<b>GA22 2000</b>	2940	1920	2	130	Flat/Spike
<b>GA32 2000</b>	2940	1920	3	130	Flat/Spike
<b>GB22 1500</b>	2940	1420	2	130	Flat/Spike
<b>GB32 1500</b>	2940	1420	3	130	Flat/Spike
<b>GB22 2000</b>	2940	1920	2	130	Flat/Spike
<b>GB32 2000</b>	2940	1920	3	130	Flat/Spike

**POST:**

TYPE	POST LENGTH	PANEL HEIGHT	HORIZONTAL BARS QTY	FLANGE
SGP2 1950	1950	1420	2	No
SGP3 1950	1950	1420	3	No
SGP2 2500	2500	1920	2	No
SGP3 2500	2500	1920	3	No

*Other dimension available upon request*

**FINISHING:**

P: Paint finish

G: Hot dip galvanized finish

**FENCE TYPE**

A: Non-Overstanding

B: Overstanding

**VERTICAL BAR DISTANT**

2: 110mm

3: 130mm

**HORIZONTAL BARS QUANTITY**

2: 2 bars

3: 3 bars

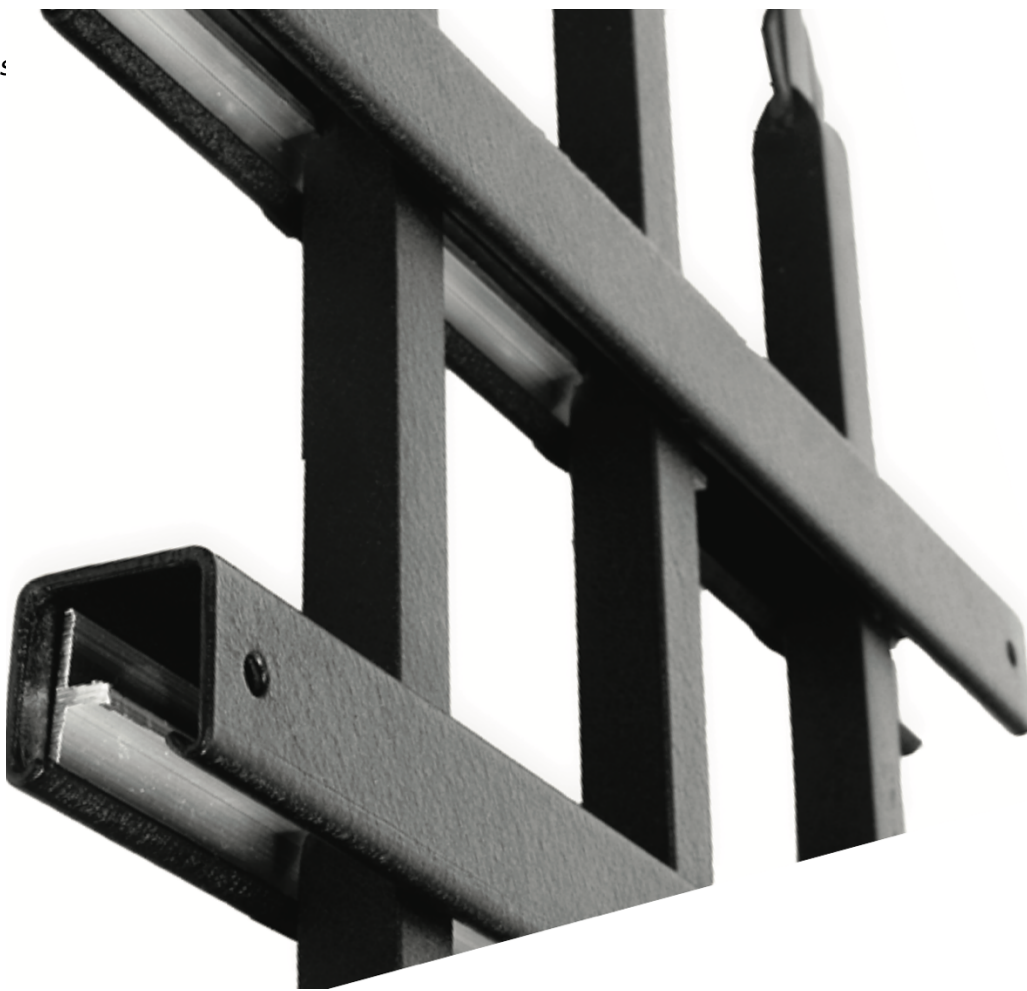
**FENCE HEIGHT**

Panel height = Fence height – 80mm

**UNIQUE  
RAILING**







## PRODUCT FEATURES

- ❖ No damage the finishing coating in installation progress.
- ❖ No accessories request
- ❖ Minimum maintenance.
- ❖ Impossible to remove the panel once installed.
- ❖ Beautiful and nice appearance.
- ❖ Modular structure, assembly, factory finished, no painting at site.
- ❖ Fast installation.
- ❖ Galvanized profile in accordance with the international standard.
- ❖ High-adherence plastic coating super durable for outdoor.
- ❖ UV resistant.
- ❖ Color: Various follow RAL color standard, basic RAL 9010 (White) RAL 9005 (Black)
- ❖ Adaptable for all types of configurations: Curves, corners, slopes,....
- ❖ Applicable to all type of soil: Rock, sand...etc
- ❖ U structure of horizontal bars allow to paint both site of product, give extremely high corrosion quality.
- ❖ 10 years warranty for hot dip galvanized finish, 3 years warranty for PE powder coating paint finish up to C3 condition, 2 years warranty for C4 conditions.



# TECNICAL SPECIFICATION

## PAINTING FINISH:

Nominal Width (mm)	2500	3000	4000
Rail Section (mm)	44x20x2.0/40x20x1.5		
Rail Number	2	3	
Filling bars section (m)	16x16x1.2/20x20x1.2/20x20x1.0		
Nominal length	1000/1200/1500/1800		
Post section (mm)	60x60x2		
Finishing	PE Powder coating		
Warranty	3 years up to C3 environment condition		

## HOT DIP GALVANIZED FINISH:

Nominal Width (mm)	2500	3000	4000
Rail Section (mm)	44x20x2.0		
Rail Number	2	3	
Filling bars section (m)	16x16x1.5/20x20x1.5		
Nominal length	1000/1200/1500/1800/2000/2200		
Post section (mm)	60x60x2		
Finishing	Hot dip galvanized finish		
Warranty	10 years up to C5 environment condition		

## CONDITION OF CORROSION

The anti-corrosion guarantee only covers rust-related faults. It is based on the European standard ISO 12944, which defines precise corrosivity categories.

Corrosion class	Corrosivity	Typical environments in a temperate climate	Distance between the products and the sea
<b>C1</b>	Very low	Inter only with very low pollution	
<b>C2</b>	Low	Temperate low pollution Countryside	>20Km from sea side
<b>C3</b>	Medium	Urban and industrial atmospheres, moderate pollution or low salinity	>20Km from sea side
<b>C4</b>	High	Industrial areas or coastal areas with moderate salinity	From 3 to 20 Km from seaside
<b>C5-I</b>	Very high	Industrial, high humidity, aggressive atmosphere	From 0.5 to 3 Km from seaside
<b>C5-M</b>	Very high	Coastal and offshore areas with high salinity	Less than 0.5 Km from seaside

## WARRANTY

### Noted:

Toerances for the anti-corrosion guarantee are defined based on ISO 4628-3 for the degree of rusting grade and ISO 4628-2 for the degree of blistering.

Corrosion class	PE powder coating	STD PU paint	Hot dip galvanized
<b>C1</b>	3	5	10
<b>C2</b>	3	5	10
<b>C3</b>	3	5	10
<b>C4</b>	2	3	10
<b>C5-I</b>	NA	1	5
<b>C5-M</b>	NA	NA	5





## APOLLO® SLIDING GATE

### KEY FEATURES:

This single leaf sliding gate boasts the latest technology and such smooth and stable operation.

The gate frame is square hollow section steel with a choice of square, mesh or round vertical bar infill. Available in a wide range of widths 3-12m and heights from 1-2.4m.

The STVS Modular sliding gate design has super strong rail system with I structure and under ground base supporter that suitable for even heavy duty truck areas. The wheels are designed for heavy duty operate give a very smooth and long last operation.

This guarantees trouble-free open/close movements and reduces maintenance.

The main gate beam is heavy duty steel that give to the gate a strong structure. The

accessories was made in Euro with designed much more than the loading of the gate weight give a perfection in operation and allow easy manual or motor-driven operation. All gate surfaces are extremely robust with high quality galvanized or high quality marine PU coated finishes (in a wide choice of colors).

- **Stable and low maintenance design**
- **Silent and very smooth operation**
- **Wide opening width (maximum 12 meters)**
- **Easily integrated with security options (Sensor, alarm light, intercom or phone)**
- **2 years warranty for motors and 2 years anti corrosion at C4.**



# TECHNICAL SPECIFICATION

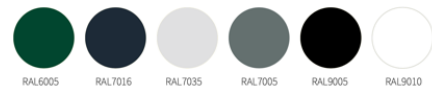
**RANGE:** **APOLLO SLIDING GATE**  
**DESIGN & MANUFACTURE:** **STVS MODULAR**

**Material:** Heavy duty steel  
**Nominal height:** 1000-2400mm  
**Nominal width:** 3000-12000mm  
**Guiding post section:** Concrete post  
**Receiving post section:** Concrete post  
**Infill:** Square bars 25x25,  
 Round bars dia 25,  
**Beam section:** 100x200mm  
**Frame section:** 75x75mm  
**Support frame section:** 60x60mm  
**Leaf:** Single/ Double  
**Operation:** Manual/Motorized  
**Warranty:** 2 years for motor,  
 2 years anti corrosion

## Finishing:

Double layer: Marine epoxy primer, PU marine coating  
 Hot dip galvanized for rack cover, guiding and receiver

## Color:



Other colours available upon request

## Control:

Remote as standard, option push bottom, intercom

## Safety device:

Infrared sensor, touch sensor, alarm light as optional



# JUPITER® SLIDING GATE

## KEY FEATURES:

This single or double leaf sliding gate boasts the latest technology and such smooth and stable operation.

The gate frame is square hollow section steel with a choice of square, mesh or round vertical bar infill. Available in a wide range of widths 3-12m and heights from 1-2.4m.

The STVS Modular sliding gate design has super strong rail system with I structure and under ground base supporter that suitable for even heavy duty truck areas. The wheels are designed for heavy duty operate give a very smooth and long last operation.

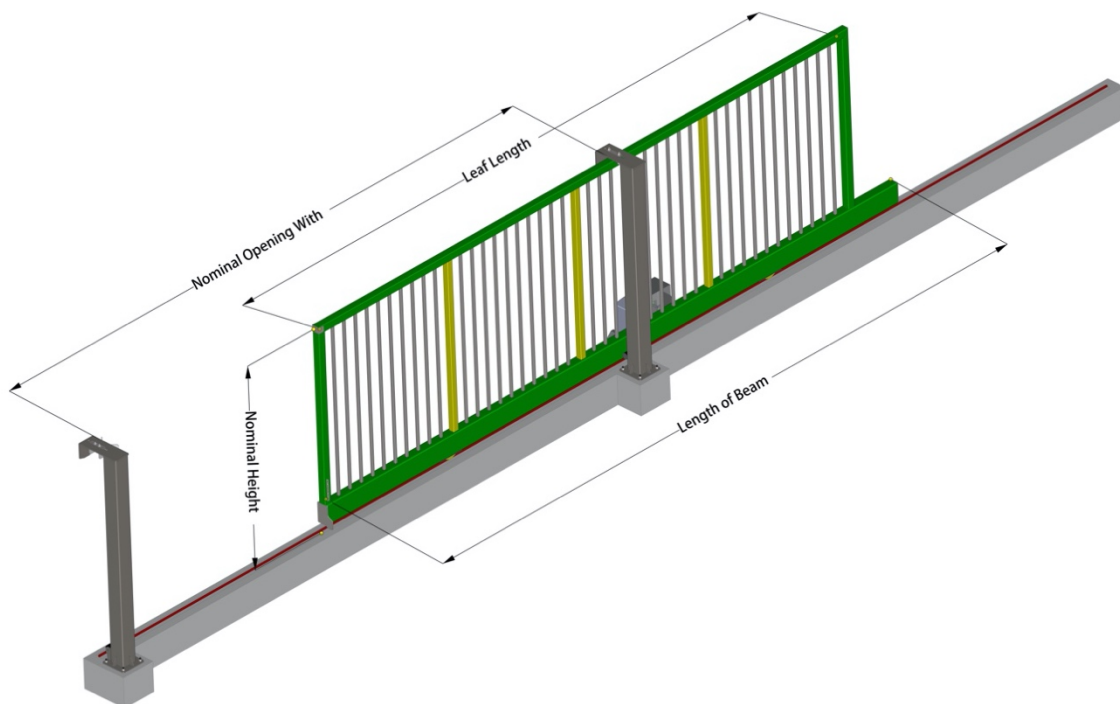
This guarantees trouble-free open/close movements and reduces maintenance.

The main gate beam is heavy duty steel that give to the gate a strong structure. The

accessories was made in Euro with designed much more than the loading of the gate weight give a perfection in operation and allow easy manual or motor-driven operation. All gate surfaces are extremely robust with high quality galvanized or high quality marine PU coated finishes (in a wide choice of colors).

- **Stable and low maintenance design**
- **Silent and very smooth operation**
- **Wide opening width (maximum 12 meters)**
- **Easily integrated with security options (Sensor, alarm light, intercom or phone)**
- **2 years warranty for motors and 5 years anti corrosion at C3.**





# TECHNICAL SPECIFICATION

## RANGE: JUPITER SLIDING GATE

<b>Material:</b>	Heavy duty steel
<b>Nominal height:</b>	1000-2400mm
<b>Nominal width:</b>	3000-12000mm
<b>Guiding post section:</b>	SP 150x150mm
<b>Receiving post section:</b>	SP 150x150mm
<b>Infill:</b>	Square bars 25x25, Round bars dia 25, Wire mesh 50x100x6
<b>Beam section:</b>	100x200mm
<b>Frame section:</b>	75x75mm
<b>Support frame section:</b>	60x60mm
<b>Leaf:</b>	Single/ Double
<b>Operation:</b>	Manual/Motorized
<b>Warranty:</b>	2 years for motor, 5 years anti corrosion

### Finishing:

Triple layer: Marine epoxy primer, epoxy middle, PU marine coating  
Hot dip galvanized for rack cover, guiding and receiver

### Color:



Other colours available upon request

### Control:

Remote as standard, option push bottom, intercom

### Safety device:

Infrared sensor, touch sensor, alarm light as optional



## JUPITER PLUS® SLIDING GATE

### KEY FEATURES:

This single or double leaf sliding gate boasts the latest technology and such smooth and stable operation.

The gate frame is stronger than JUPITER SLIDING GATE ranger with 2 double guiding post and main beam stronger that allow bigger opening but also keep reasonable price. Available in a wide range of widths 3-15m and heights from 1-2.2m. The STVS Modular sliding gate design has super strong rail system with I structure and under ground base supporter that suitable for even heavy duty truck areas. The wheels are designed for heavy duty operate give a very smooth and long last operation.

This guarantees trouble-free open/close movements and reduces maintenance.

The main gate beam is heavy duty steel that give to the gate a strong structure. The

accessories was made in Euro with designed much more than the loading of the gate weight give a perfection in operation and allow easy manual or motor-driven operation. All gate surfaces are extremely robust with high quality galvanized or high quality marine PU coated finishes (in a wide choice of colors).

- **Stable and low maintenance design**
- **Silent and very smooth operation**
- **Wide nominal opening (maximum 14 meters).**
- **Easily integrated with security options (Sensor, alarm light, intercom or phone)**
- **2 years warranty for motors and 5 years anti corrosion at C3.**



# TECHNICAL SPECIFICATION

## RANGE: JUPITER PLUS SLIDING GATE

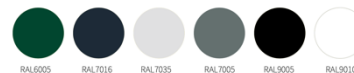
<b>Material:</b>	Heavy duty steel
<b>Nominal height:</b>	1000-2200mm
<b>Nominal width:</b>	3000-15000mm
<b>Guiding post section:</b>	DP 150x150mmx2
<b>Receiving post section:</b>	DP 150x150mm
<b>Infill:</b>	Square bars 25x25, Round bars dia 25, Wire mesh 50x100x6
<b>Beam section:</b>	100x200mm
<b>Frame section:</b>	75x75mm
<b>Support frame section:</b>	60x60mm
<b>Leaf:</b>	Single/ Double
<b>Operation:</b>	Manual/Motorized
<b>Warranty:</b>	2 years for motor, 5 years anti corrosion up to C3 environment condition (According to IS) 12944-2)

### Finishing:

Triple layer: Marine epoxy primer, epoxy middle, PU marine coating

Hot dip galvanized for rack cover, guiding and receiver

### Color:



Other colours available upon request

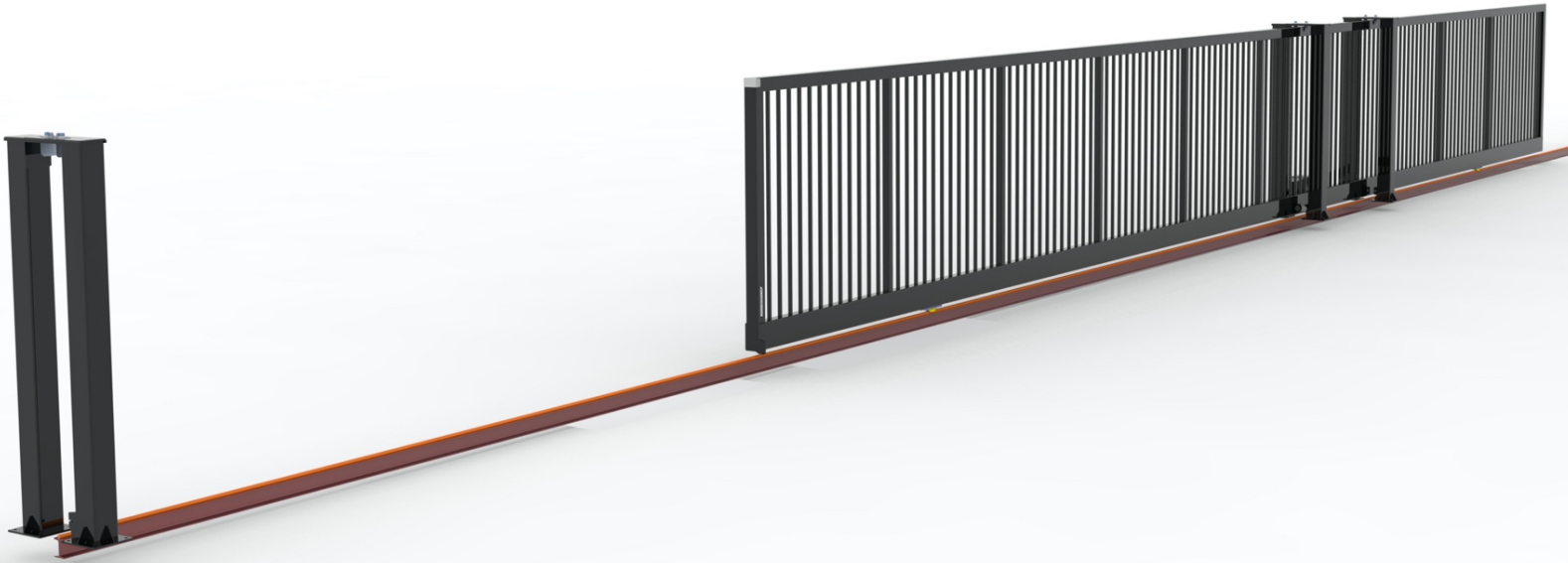
### Control:

Remote as standard, option push bottom, intercom

### Safety device:

Infrared sensor, touch sensor, alarm light as optional





## THE SUN® SLIDING GATE

### KEY FEATURES:

This single leaf sliding gate boasts the latest technology, such smooth and stable operation.

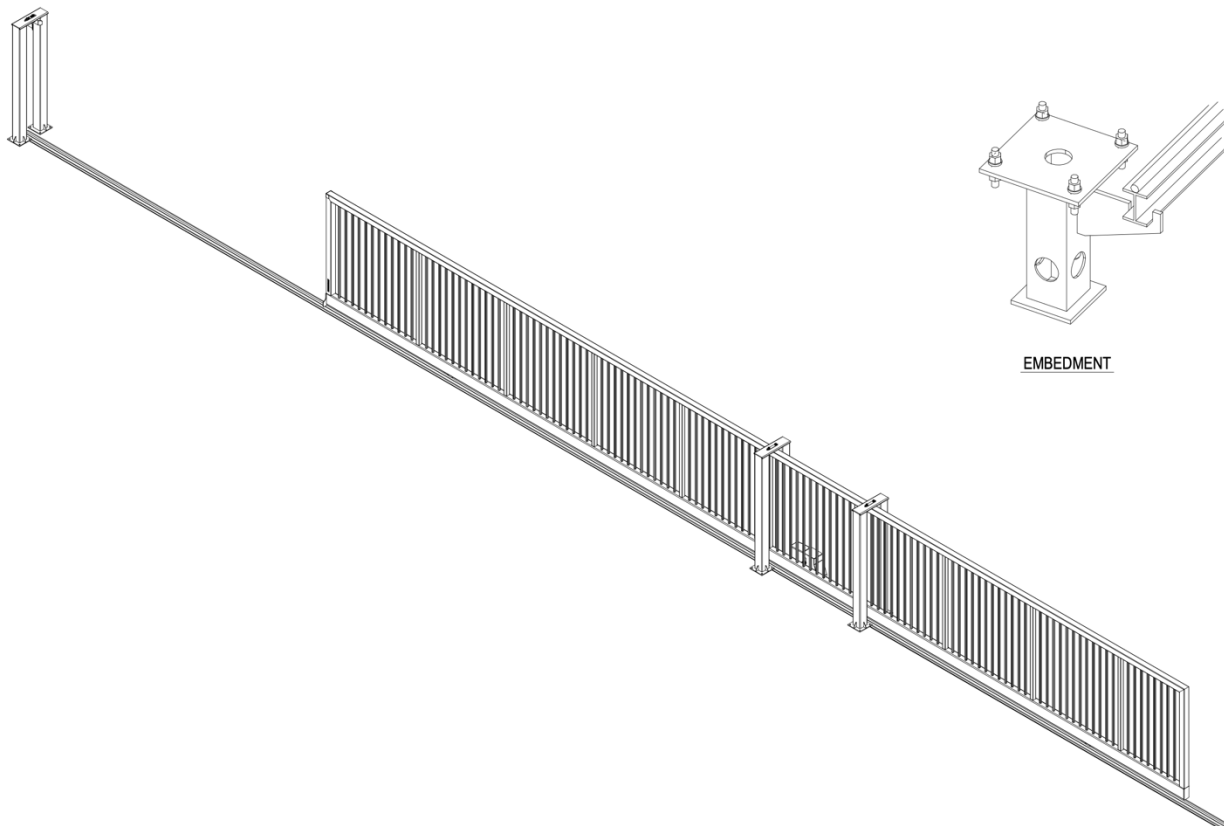
The Sun sliding gate design for unique, larger opening and stable purpose. The gate structure and beam is heavy duty that allow the opening up to 18m and heights from 1-2.4m.

The STVS Modular sliding gate design has super strong rail system with I structure and under ground base supporter that suitable for even heavy duty truck areas. The wheels are designed for heavy duty operate give a very smooth and long last operation.

This guarantees trouble-free open/close movements and reduces maintenance.

The accessories was made in Euro with designed much more than the loading of the gate weight give a perfection in operation and allow smooth operation on motor-driven. All gate surfaces are extremely robust with high quality marine PU coated finishes (in a wide choice of colors).

- **Stable and low maintenance design**
- **Silent and very smooth operation**
- **Wide opening width up to 18 meters**
- **Easily integrated with security options (Sensor, alarm light, intercom or phone)**
- **1 years warranty for motors and 5 years anti corrosion at C3.**



# TECHNICAL SPECIFICATION

## RANGE:

## SUN SLIDING GATE

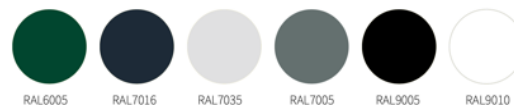
<b>Material:</b>	Heavy duty steel
<b>Nominal height:</b>	1000-2400mm
<b>Nominal width:</b>	3000-18000mm
<b>Guiding post section:</b>	DP 150x150mmx2 post
<b>Receiving post section:</b>	DP 150x150mm
<b>Infill:</b>	Square bars 25x25, Round bars dia 25, Wire mesh
<b>Beam section:</b>	150x200mm
<b>Frame section:</b>	100x100mm
<b>Support frame section:</b>	75x75mm
<b>Leaf:</b>	Single/ Double
<b>Operation:</b>	Motorized
<b>Warranty:</b>	1 years for motor. 5 years anti corrosion

## Finishing:

Triple layer: Marine epoxy primer, epoxy middle, PU marine coating

Hot dip galvanized for rack cover, guiding and receiver

## Color:



Other colours available upon request

## Control:

Remote as standard, option push bottom, intercom

## Safety device:

Infrared sensor, touch sensor, alarm light as optional



# TELESCOPIC SLIDING GATE

## KEY FEATURES:

This gate boasts the latest technology, such smooth and stable operation.

The telescopic sliding gate design for small sliding back space and stable purpose. The gate structure and accessories is unique and know how design by STVS Modular.

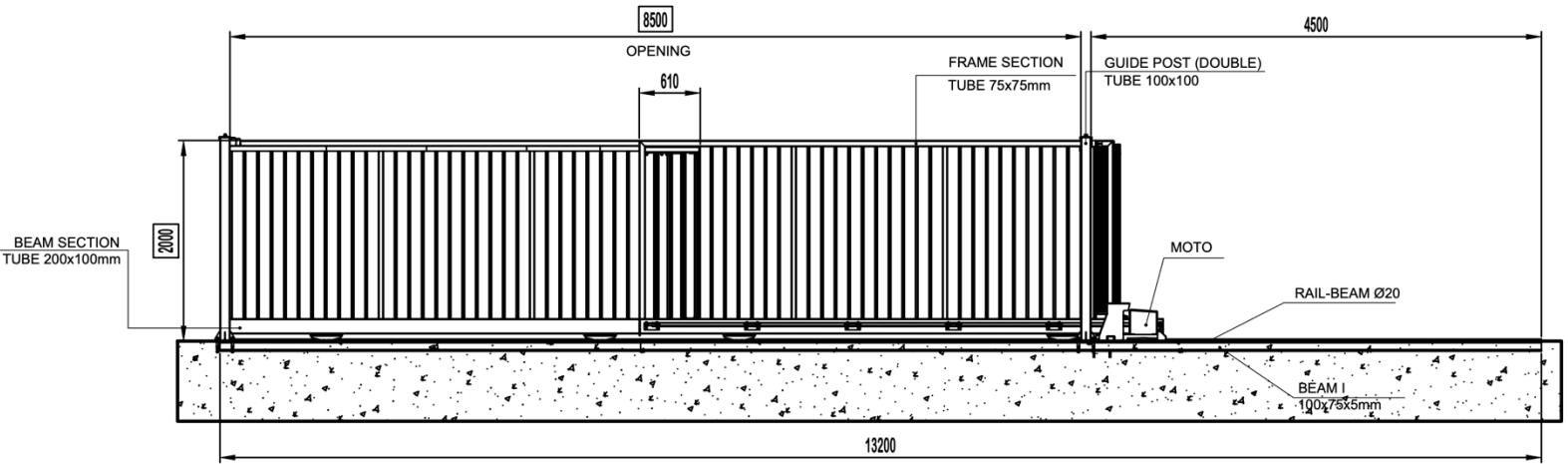
The STVS Modular sliding gate design has super strong rail system with I structure and under ground base supporter that suitable for even heavy duty truck areas. The wheels are designed for heavy duty operate give a very smooth and long last operation.

This guarantees trouble-free open/close movements and reduces maintenance.

The accessories was made in Euro with designed much more than the loading of the gate weight give a perfection in operation and allow smooth operation on motor-driven. All gate surfaces are extremely robust with high quality marine PU coated finishes (in a wide choice of colors).

- **Small sliding back space needed**
  - **Stable and low maintenance design**
  - **Opening width up to 12 meters**
  - **Easily integrated with security options (Sensor, alarm light, intercom or phone)**
- 2 years warranty for motors and 5 years anti corrosion at C3.**





## TECHNICAL SPECIFICATION

### RANGE:

### TELESCOPIC SLIDING GATE

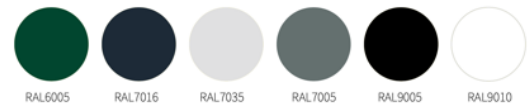
<b>Material:</b>	Heavy duty steel
<b>Nominal height:</b>	1000-2200mm
<b>Nominal width:</b>	3000-12000mm
<b>Guiding post section:</b>	DP 150x150mm
<b>Receiving post section:</b>	DP 150x150mm
<b>Infill:</b>	Square bars 25x25, Round bars dia 25, Wire mesh 50x50
<b>Beam section:</b>	100x200mm
<b>Frame section:</b>	75x75mm
<b>Support frame section:</b>	60x60mm
<b>Leaf:</b>	Single/ Double
<b>Operation:</b>	Motorized
<b>Warranty:</b>	2 years for motor. 5 years anti corrosion

### Finishing:

Triple layer: Marine epoxy primer, epoxy middle, PU marine coating

Hot dip galvanized for rack cover, guiding and receiver

### Color:



Other colours available upon request

### Control:

Remote as standard, option push bottom, intercom

### Safety device:

Infrared sensor, touch sensor, alarm light as optional

# MOTOR DRIVEN

- **Motor speed up to 8m/min for gate size: 16-18mW (Sun).**
- **Motor speed up to 9m/min for gate size: 10-12mW**
- **Motor speed up to 13m/min for gate size: 3-9mW.**
- **Slows at the start and end of the cycle (smooth jolt-free operation)**
- **Up to 40 cycles per hour for 6m openings (1 cycle = 1 opening + 1 closing)**
- **Not affected by adverse weather conditions**
- **24 VDC backup battery ensures continued operation in the event of a supply failure**
- **Lifetime lubrication**
- **Includes set of cells for lightweight vehicles**
- **2-year guarantee**



The automation is made up of a self-locking gear motor controlled by magnetic encoder with an in-built:

- Electronic programmer;
- 433MHz FM receiver;
- slot-in battery charger;
- NiMH batteries.



MANUAL RELEASE SLX3024CB



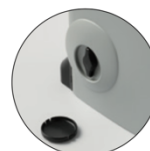
SELF-PROGRAMMING MONITORED BY AN LCD GRAPHICS DISPLAY



MANUAL RELEASE SLX1524CB



MANUAL RELEASE SLX24DRACD



MANUAL RELEASE SL524

The electronic programmer is factory fitted with a graphic LCD display (128 x 128 pixels) with backlighting in six different languages. The menu allows you to rapidly set the system parameters including: the sequential button mode, automatic reclosing, warning lamp pre-flashing, intermittent warning lamp activation, indicator light and photoelectric cell function setting etc.

The electronics card, thanks to the presence of the real-time clock, allows you to set 10 events (shown on the display) and these events permit you to regulate the opening and closing of the motor at different times during the day within 3 weekly time bands (Mon- Fri, Sat-Sun, Mon-Sun); the events can be enabled or disabled (during holiday periods) either from the menu or by means of a radio channel. The appliance is fitted with a safe and secure manual release system activated by a personalised key.







# SWING GATE

## RANGE:

## MANUAL SWING GATE

<b>Material:</b>	Steel
<b>Nominal height:</b>	1000-2400mm
<b>Nominal width:</b>	900-10000mm
<b>Post section:</b>	80x80mm@2post
<b>Infill:</b>	Square bars 25x25, Round bars dia 25, Wire mesh
<b>Frame section:</b>	50x50mm
<b>Leaf:</b>	Single/ Double
<b>Operation:</b>	Manual
<b>Warranty:</b>	5 years anti corrosion

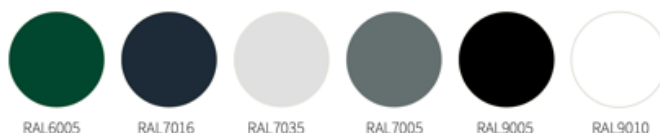
## Finishing:

Triple layer: Marine epoxy primer, epoxy middle, PU marine coating

## Hardware:

High quality Euro Made hardware

## Color:



Other colours available upon request

Nominal Passage (mm)		1000	1200	1500	2000	2500	3000	3500	4000
Frame section (mm)		50x50x2			50x50x3				
Infill section (mm)		25x25x1.5							
Space under gate leaf (mm)		80							
Nominal height	Post length	Post section (mm)							
1000	1500	80x80x3				100x100x3		150x150x3	
1200	1700	80x80x3				100x100x3		150x150x3	
1500	2000	80x80x3			100x100x3		150x150x3		
1800	2500	80x80x3		100x100x3		150x150x3			
2000	2700	80x80x3	100x100x3			150x150x3			



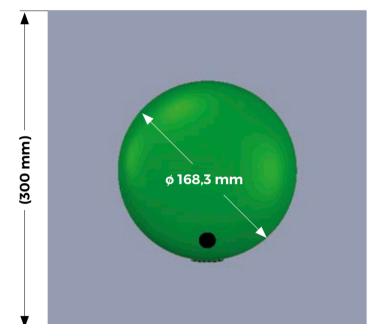
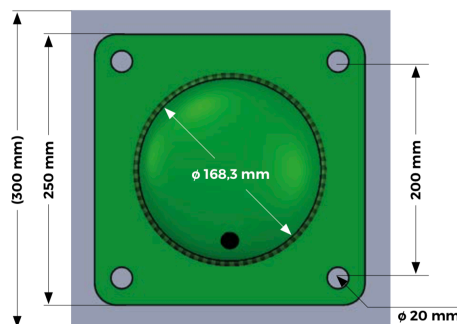
## BOLLARDS

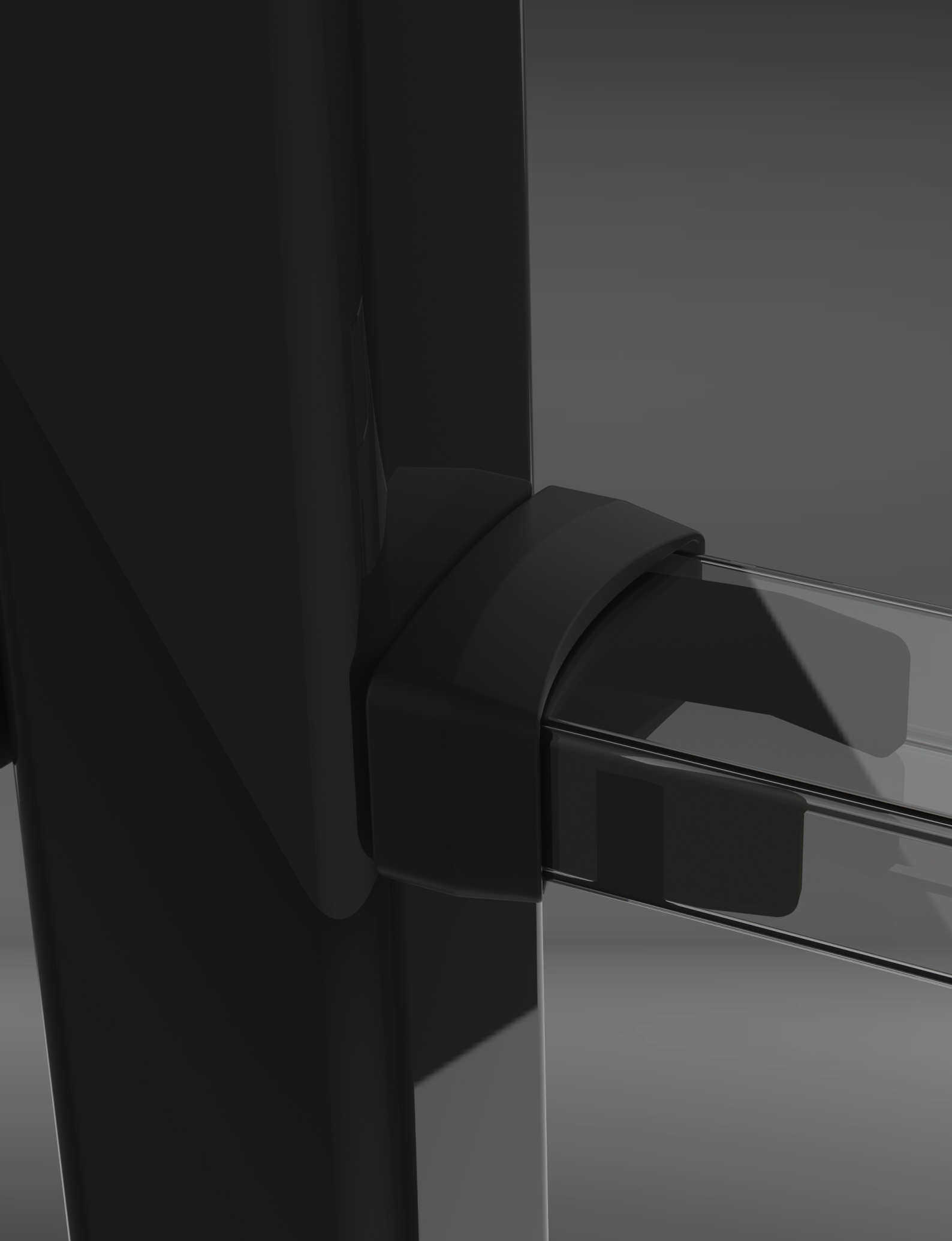


- Base plate thickness 10mm

### KEY FEATURE:

- ❖ Beautiful appearance
- ❖ Super round top
- ❖ Marine painting applied
- ❖ Very smooth and shine
- ❖ 3M reflective





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Phone: +84 938770765

**STV**'

**M O D U L A R**