

CLASSIC & DESIGN 80 TELESCOPIC PROGRESSIVE SLIDING SYSTEMS

HAFELE

CLASSIC AND DESIGN 80 TELESCOPIC PROGRESSIVE

Häfele houses a comprehensive range of Sliding Systems under its SLIDO range for every imaginable indoor and outdoor application. These solutions not only add emphasis to your interiors but also serve as a lavish gateway to the world beyond. They offer unconditional access and optimal functionality coupled with distinctive designs and the latest technologies. But with the continuous evolution in technology, more is always less and the question, 'What else?' constantly drives us to take that next step and introduce something that would add a 'wow' factor to your everyday activities.

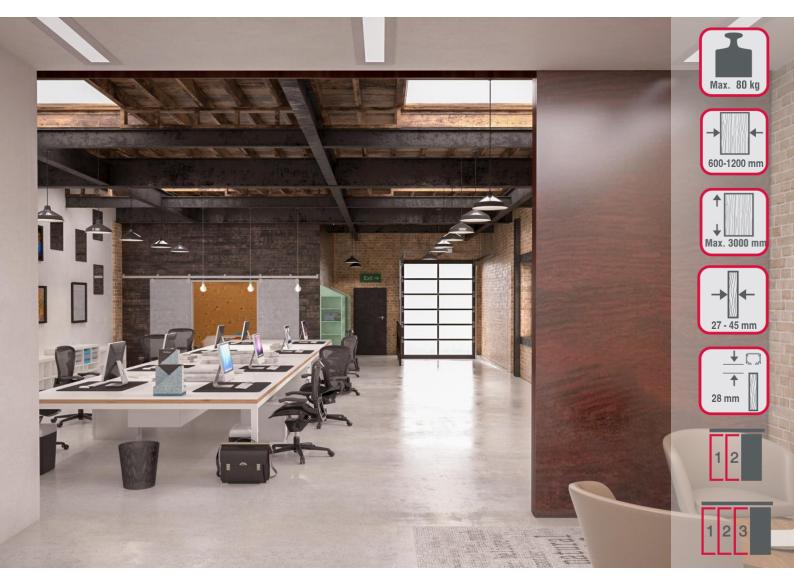
To achieve this, Häfele introduces the new Classic and Design 80 Telescopic Progressive Sliding Systems to its Slido range of sliding fittings for your internal partitions and doors. These systems demonstrate the highest form of quality as the components are completely fabricated in European manufacturing units and adhere to European standards. The Telescopic Progressive systems offer you seamless transitions between spaces. The doors in this system move in unison when one door is pushed or pulled hence reducing the amount of force required to open or close the doors. A distinctly notable feature of the Telescopic Progressive systems is its bottom guide which is designed to be hidden when the doors are stacked on one side, leaving the passage completely free. You thus have an effortless and obstacle-free movement everywhere.

The new Telescopic Progressive Systems by Häfele are available in two variants - Classic (for Wooden Door Sliding) and Design (for Glass Door Sliding) with an option of choosing from a 2 door or a 3 door version under each variant. The excellent make and build of each and every component in the system combined together grants the system its optimum and steady functionality. The ground shielded ball bearings inside the runners enable a smooth and silent operation. The rollers and carriages are made of extremely durable and impact resistant materials thereby extending the product life and preventing repetitive maintenance problems. The Classic 80 system enhances privacy and gives a clear distinction between different areas in your interiors while the Design 80 system gives way to open and bright spaces.

Characterized by innovation, development and great design, both the Telescopic Progressive Sliding Systems offer you the complete sliding solution for every threshold in your homes and offices.



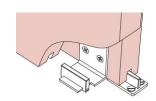




CLASSIC 80 TELESCOPIC PROGRESSIVE

- Top hung straight sliding system for wooden doors in internal spaces
- High quality parts and components manufactured in Europe
- · Maximum 3 doors on one side are allowed
- When one door is pushed or pulled, the other doors move simultaneously in tandem
- The floating bottom guides* are installed on the sliding doors keeping them hidden when the doors are parked. This leaves a completely free passage for you when the doors are stacked on one side
- The roller and hanger are made of Zamak which reduces the risk of rusting and damage
- Ground shielded ball bearings inside the rollers enable silent and smooth operation
- Roller wheels are made of DELRIN a special anti-wear compound that offers higher tensile strength, stiffness and impact resistance
- Mechanism is available for both left hand and right hand doors

SPECIFICATIONS:			
Load Capacity	Max. 80 kg per panel		
Number of Doors	2 to 3 doors		
Application	Internal Doors		
Door Thickness	27 – 45 mm		
Door Width	600 – 1200 mm		
Door Height	Max. 3000 mm		
Gap Between Top Track and Door	28 mm		



* Floating bottom guides are installed on the sliding doors.
Hence they are not seen after the doors are stacked.



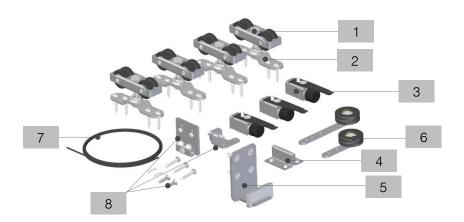
COMPONENTS

TOP TRACK

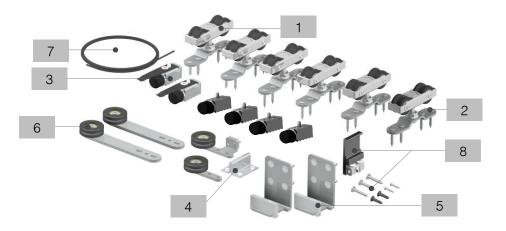


Top track for the sliding door – 3600 mm 940.99.604

BOM KIT



Kit for two doors - 941.27.002



Kit for three doors - *941.27.003*

- 1 Roller
- 2 Carriage set
- 3 Stoppers
- 4 Fixed bottom guide
- 5 Floating bottom guide
- 6 Pulley
- 7 Belt
- 8 Supporting Brackets and accessories

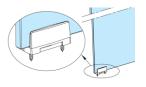




DESIGN 80 TELESCOPIC PROGRESSIVE

- Top hung straight sliding system for glass doors in internal spaces
- High quality parts and components manufactured in Europe
- · Maximum 3 doors on one side are allowed
- When one door is pushed or pulled, the other doors move simultaneously in tandem
- The floating bottom guides* are installed on the sliding doors keeping them hidden when the doors are parked. This leaves a completely free passage for you when the doors are stacked on one side
- The roller, hanger and carriage set body are made of Zamak which reduces rusting and damage
- The carriage set is fitted with leather pads to hold on to the glass door firmly and to prevent scratches on the glass surface
- Ground shielded ball bearings inside the roller enable silent and smooth operation
- Roller wheels are made of DELRIN a special anti-wear compound that offers higher tensile strength, stiffness and impact resistance
- · Mechanism is available for both left hand and right hand doors

SPECIFICATIONS:			
Load Capacity	Max. 80 kg per panel		
Number of Doors	2 to 3 doors		
Application	Internal Doors		
Door Thickness	8 – 12 mm		
Door Width	600 – 1200 mm		
Door Height	Max. 2400 mm		
Gap Between Top Track and Door	28 mm		



* Floating bottom guides are installed on the sliding doors. Hence they are not seen after the doors are stacked.



COMPONENTS

TOP TRACKS

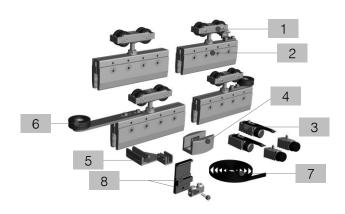


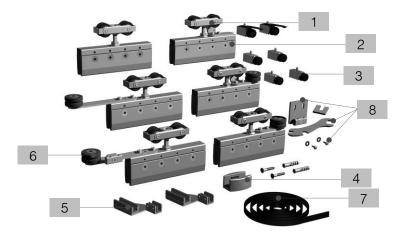
Top track for sliding door – 3600 mm 940.99.604



Top track for fixed panel – 3000 mm 940.99.830

BOM KIT



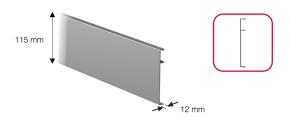


Kit for two doors - 941.27.436

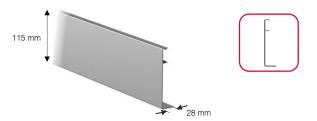
Kit for three doors - 941.27.437

- 1 Roller2 Carriage set3 Stoppers
- 4 Fixed bottom guide
- 5 Floating bottom guide
- 6 Pulley
- 7 Belt
- 8 Supporting brackets and accessories

TRIM COVERS



Trim cover with a short flap – 3000 mm 940.99.730



Trim cover with a long flap – 3000 mm 940.99.732

FUNCTIONS OF THE TRIM COVER:

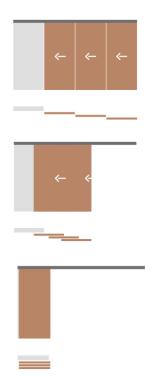
- Trim covers are used to hide the system hardware making it aesthetically pleasing and protecting it from the external environment
- In places where you want the system visibility to be as minimum as possible, trim cover with long flap can be used instead of the short flap
- Different combinations of trim covers lead to different system widths. Refer to page nos. 9 and 10 for details



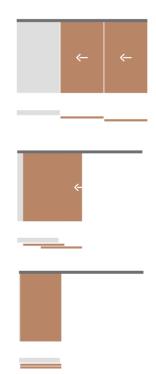
THE MOVEMENT OF THE DOORS

CLASSIC 80 TELESCOPIC PROGRESSIVE

THREE DOORS



TWO DOORS

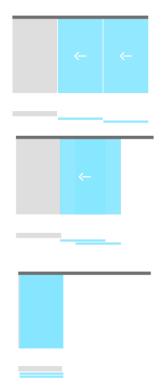


DESIGN 80 TELESCOPIC PROGRESSIVE

THREE DOORS



TWO DOORS

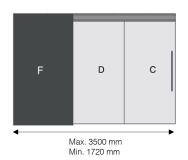




INSTALLATION POSSIBILTIES FOR TELESCOPIC PROGRESSIVE SYSTEMS

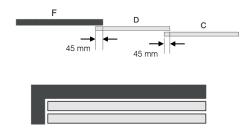
The following configurations can be achieved with Classic 80 and Design 80 Telescopic Progressive systems.

FOR TWO DOORS

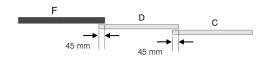


- C Exterior door
- D Interior door
- F Fixed panel
- S Overlap width of exterior door

LEVELLED SYSTEM

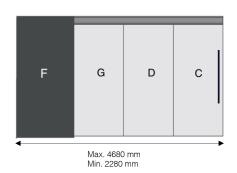


OVERLAP SYSTEM



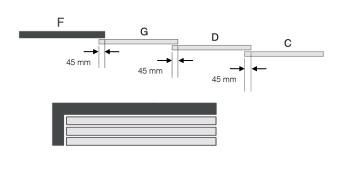


FOR THREE DOORS

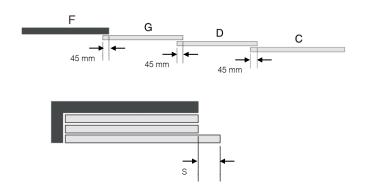


- C Exterior door
- D Central door
- G Interior door
- F Fixed panel
- S Overlap width of exterior door

LEVELLED SYSTEM



OVERLAP SYSTEM



Note 1:

- The fixed panel can be either wood or glass.
- The overlap system is useful when you want to install handles on both the sides of the exterior door.



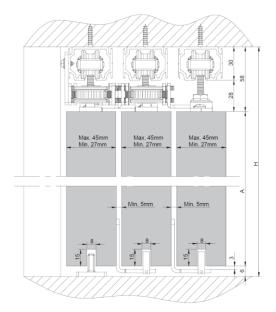
INSTALLATION

A = Height of Sliding Door; H = Total Opening Height

CLASSIC 80 TELESCOPIC PROGRESSIVE

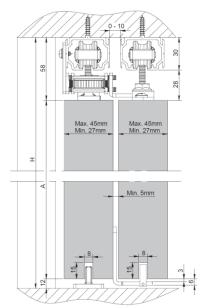
FOR THREE DOORS

A = H - 70



FOR TWO DOORS

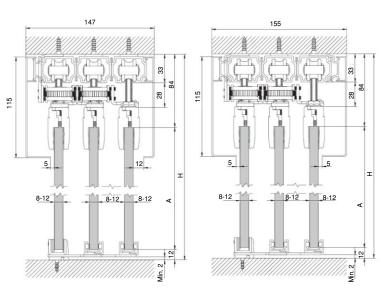
A = H - 70



DESIGN 80 TELESCOPIC PROGRESSIVE

FOR THREE DOORS

A = H - 96

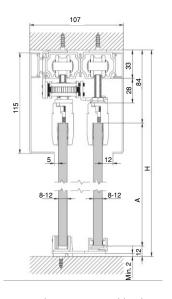


3 door system with trim cover with long flap on one side and short flap on the other

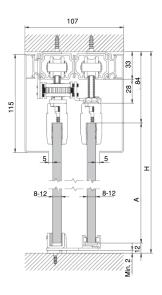
3 door system with trim covers with long flaps on both sides

FOR TWO DOORS

A = H - 96



2 door system with trim cover with long flap on one side and short flap on the other



2 door system with trim covers with long flaps on both sides

Note 2: In both the above configurations, the height of the fixed panel changes according to its method of installation. Wooden fixed panels can be installed by making a groove in the ceiling and glass fixed panels can be installed with the help of clamps, aluminium profiles, etc., The height of the fixed panel is calculated accordingly.



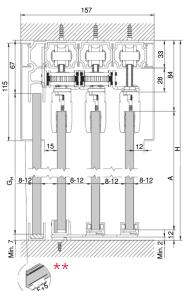
INSTALLATION

A = Height of Sliding Door; H = Total Opening Height; G_H = Height of Fixed Panel; F = Width of Fixed Panel

DESIGN 80 TELESCOPIC PROGRESSIVE WITH TRACK FOR FIXED PANEL

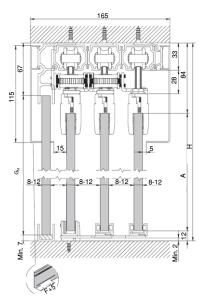
FOR THREE DOORS

A = H - 96 $G_H = H - 74$



3 door system with trim cover with long flap on one side and short flap on the other

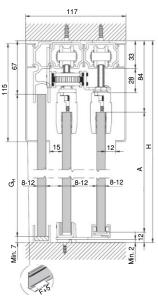
3 door system with trim covers with short flaps on both sides

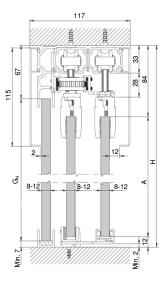


3 door system with trim covers with long flaps on both sides

FOR TWO DOORS

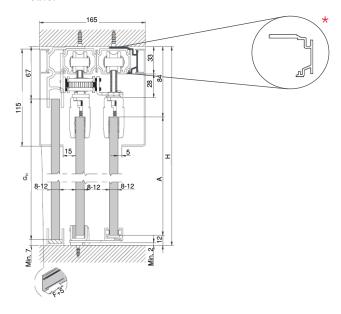






2 door system with trim cover with long flap on one side and short flap on the other

2 door system with trim covers with short flaps on both sides



2 door system with trim covers with long flaps on both sides

Note 3: In case of Design 80 Telescopic Progressive Sliding Systems, you can install the trim covers along the full length of the system or you can follow the trim cover calculations shown on pages 11-12.

^{*}When you use a long trim cover on the exterior door side, you have to add an extra support – trim cover support as highlighted in the figure above.

^{**} When a trim cover with long flap is installed on the fixed panel side, the flap has to be cut for a length of (F + 5) to accommodate the fixed panel.

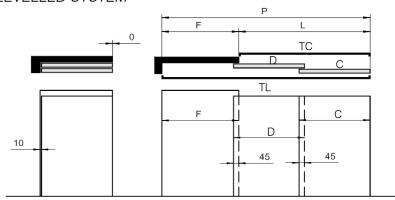


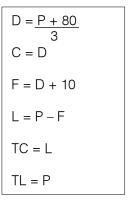
DOOR CALCULATIONS

CLASSIC AND DESIGN 80 TELESCOPIC PROGRESSIVE FOR 2 DOORS

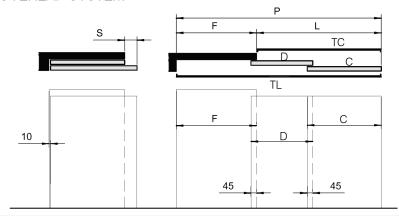
D = Width of Interior Door; C = Width of Exterior Door; F = Width of Fixed Panel; P = Total Opening Width; TC = Outer Trim Cover; TL = Inner Trim Cover; S = Overlap of the Exterior Door in Overlap system; H = Total Opening Height; A = Height of Sliding Door

LEVELLED SYSTEM





OVERLAP SYSTEM



$$D = P + 80 - S$$

$$3$$

$$C = D + S$$

$$F = D + 10$$

$$L = P - F$$

$$TC = L$$

$$TL = P$$

Note 4:

- Outer and Inner trim cover lengths are determined here considering that the doors are parked on the inside. If your doors are going
 to be parked on the outside, the measurements of the inner and outer trim covers will be reversed.
- The overlap of 45 mm between each door should not be confused with the overlap of the Exterior Door in overlap system, 'S'. 'S' can be equal to, more than or less than 45 mm.

Example 1: There is an opening 3000 mm in width and 2400 mm in height. The customer wants to install a two door Classic Telescopic Progressive system here.

H = 2400 mm; P = 3000 mm

For a **Classic** system, the height of the sliding door will be A = H - 70 = 2330 mm.

The height of the fixed panel will change according to the method of installation and can be calculated at the time of installation

For the door width calculations, we can have a Levelled system or an Overlap System

Levelled System:

Interior Door (D) = $(P + 80)/3 = (3000 + 80)/3 = 1026.666 \sim 1027$ mm Exterior Door (C) = D = 1027 mm Width of fixed panel (F) = D + 10 = 1027 + 10 = 1037 mm L = P - F = 3000 - 1037 = 1963 mm

Outer Trim Cover (TC) = L = 1963 mm; Inner Trim Cover (TL) = P = 3000 mm

Overlap System:

Let's assume the exterior door overlap to be 50 mm; So S = 50 mm

Interior Door (D) = (P + 80 - S)/3 = (3000 + 80 - 50)/3 = 1010

Exterior Door (C) = D + S = 1010 + 50 = 1060 mm

Width of fixed panel (F) = D + 10 = 1010 + 10 = 1020 mm

L = P - F = 3000 - 1020 = 1980 mm

Outer Trim Cover (TC) = L = 1980 mm; Inner Trim Cover (TL) = P = 3000 mm

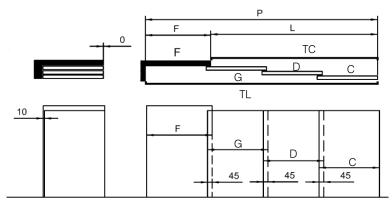


DOOR CALCULATIONS

CLASSIC AND DESIGN 80 TELESCOPIC PROGRESSIVE FOR 3 DOORS

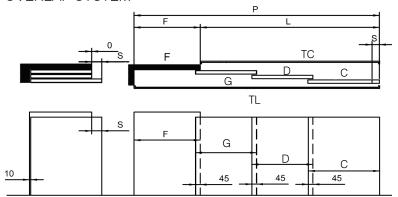
D = Width of Central Door; C = Width of Exterior Door; G = Width of Interior Door, P = Total Opening Width; F = Width of Fixed Panel; TC = Outer Trim cover; TL = Inner Trim Cover; S = Overlap of the Exterior Door in Overlap System; H = Total Opening Height; A = Height of Sliding Door; G_H = Height of Fixed Panel

LEVELLED SYSTEM



D = P + 125
C = D 4
G = D
F = D + 10
L = P - F
TC = L
TL = P

OVERLAP SYSTEM



$$D = \frac{(P + 125 - S)}{4}$$

$$C = D + S$$

$$G = D$$

$$F = D + 10$$

$$L = P - F$$

$$TC = L$$

$$TL = P$$

Note 4

- Outer and Inner trim cover lengths are determined here considering that the doors are parked on the inside. If your doors are going
 to be parked on the outside, the measurements of the inner and outer trim covers will be reversed.
- The overlap of 45 mm between each door should not be confused with the overlap of the Exterior Door in overlap system, 'S'. 'S' can be equal to, more than or less than 45 mm.

Example 2: There is an opening 4500 mm in width and 2400 mm in height. The customer wants to install a **Three door Design Telescopic Progressive** system here.

H = 2400 mm; P = 4500 mm

For a **Design** system, the height of the sliding door will be A = H - 96 = 2400 - 96 = 2304 mm.

When installed without the fixed panel track, the height of the fixed panel will vary according to the hardware used for installation. If the fixed panel is installed with the fixed panel track, the height of the fixed glass panel will be

 $G_H = H - 74 = 2400 - 74 = 2326 \text{ mm}$

For the door width calculations, we can have a Levelled system or Overlap System

Levelled System:

Central Door (D) = (P + 125)/4 = (4500 + 125)/4 = 1156 mm

Exterior Door (C) = D = 1156 mm

Interior Door (G) = D = 1156 mm

Width of fixed panel (F) = D + 10 = 1156 + 10 = 1166 mm

L = P - F = 4500 - 1166 = 3334 mm

Outer Trim Cover (TC) = L = 3334 mm; Inner Trim Cover (TL) = P

 $= 4500 \, \text{mm}$

Overlap System:

Let's assume the exterior door overlap of 50 mm; So S = 50 mm Central Door (D) = (P + 125 - S)/4 = (4500 + 125 - 50)/4 =

1143.75 ~ 1144 mm

Exterior Door (C) = D + S = 1144 + 50 = 1194 mm

Interior Door (G) = D = 1144 mm

Width of fixed panel (F) = D + 10 = 1144 + 10 = 1154 mm

L = P - F = 4500 - 1154 = 3346 mm

Outer Trim Cover (TC) = L = 3346 mm; Inner Trim Cover (TL) = P = 4500 mm



TRACK CALCULATIONS

There are two ways in which the Top Tracks can be installed:

- 1. Along the complete length of the opening width
- 2. Varying lengths according to the movement of doors and as per calculation

The following examples will help you understand both of these installation possibilities in detail.

ALONG THE COMPLETE LENGTH OF THE OPENING WIDTH

Example: There is an opening 4600 mm in width and 2400 mm in height. The customer wants to install a two door Classic 80 Telescopic Progressive Sliding System.

Considering that we are installing full length tracks, total track length = 4600 x 3 = 13,800 mm.

The length of a single Top Track provided by Häfele is 3600 mm. Hence, we need to order 4 units of the Top Track (940.99.604) for this system.

VARYING LENGTHS ACCORDING TO THE MOVEMENT OF DOORS

FOR TWO DOORS

Track length for exterior door = Total Opening Width Track length for interior door = $2 \times \text{Width of Interior Door+150}$ Track length for fixed panel (only in case of Design 80) = Width of Fixed Panel

FOR THREE DOORS

Track length for exterior door = Total Opening Width Track length for central door = $3 \times \text{Width}$ of Central Door+150 Track length for interior door = $2 \times \text{Width}$ of Interior Door+150 Track length for fixed panel (only in case of Design 80) = Width of Fixed Panel

Example: There is an opening 4600 mm in width and 2400 mm in height. The customer wants to install a three door Design 80 Telescopic Progressive Sliding System, what tracks will be required and how many?

We need the widths of the different doors to calculate the length of the tracks. Let's consider a levelled system.

Central Door (D) = (P + 125)/4 = (4600 + 125)/4 = 1181 mm

Track length for the central door = $(3 \times \text{door width}) + 150 = (3 \times 1181) + 150 = 3693 \text{ mm}$

Exterior Door (C) = D = 1181 mm

Track length for the exterior door = Total opening width = 4600 mm

Interior Door (G) = D = 1181 mm

Track length for the interior door = $(2 \times \text{door width}) + 150 = (2 \times 1181) + 150 = 2512 \text{ mm}$

Total track length required for sliding doors = 3693 + 4600 + 2512 = 10805 mm

We have a top track of 3600 mm. Hence, we will need to order 3 tracks (940.99.604)

If fixed panel is fixed using the fixed panel track provided by Häfele, the below calculation needs to be followed. If the fixed panel is fixed using other hardware (profiles, clamps, etc.,) then you can skip this calculation.

Width of fixed panel (F) = D + 10 = 1181 + 10 = 1191 mm

Track length for ixed panel = Width of fixed panel = 1191 mm

We have a fixed panel track of length 3000 mm. Hence, we will need to order 1 Top Track for Fixed Panel (940.99.830)

Outer Trim Cover (TC) = L = P - F = 4600 - 1191 = 3409 mm; Inner Trim Cover (TL) = P = 4600 mm

Trim cover with short and long flap (940.99.730 and 940.99.732 respectively) both have a length of 3000 mm. As per your choice of flap, two trim covers for outer side and two trim covers for inner side will be required. Refer to pages 9 – 10 for more information on trim covers.

If you choose to install a Trim Cover with Long Flap on the exterior door side, you will need a Trim Cover Support Track (940.99.080). The number of units required will vary according to the way you use the Trim Cover Support Track. You can install whole tracks along the full length of the Top Track or divide it into pieces and install them at equidistant positions along the length of the Top Track.

Note 5: For Design 80 systems, trim covers can be also installed along the complete length of the opening width instead of the calculation in the above example.



ORDERING INFORMATION

Article No.	Description	Qty	UOM	MRP (INR)
	CLASSIC 80 TELESCOPIC PROGRESSIVE	SLIDING SYS	TEM	
941.27.002	Basic kit for 2 doors Consisting of: 4 Rollers 4 Carriage Sets 4 Stoppers 2 Pulleys 1 Fixed Bottom Guide 1 Floating Bottom Guide 1 Belt Supporting Brackets and Accessories	1	SET	34,772/-
941.27.003	Basic kit for 3 doors Consisting of: 6 Rollers 6 Carriage Sets 6 Stoppers 4 Pulleys 1 Fixed Bottom Guide 2 Floating Bottom Guide 1 Belt Supporting Brackets and Accessories	1	SET	56,209/-
940.99.604	Top Track: 3600 mm	1	PC	7,704/-
941.27.436	DESIGN 80 TELESCOPIC PROGRESSIVE S Basic kit for 2 doors Consisting of: 4 Rollers 4 Carriage Sets 4 Stoppers 2 Pulleys 1 Fixed Bottom Guide 1 Floating Bottom Guide 1 Belt Supporting Brackets and Accessories	1	SET	75,862/-
941.27.437	Basic kit for 3 doors Consisting of: • 6 Rollers • 6 Carriage Sets • 6 Stoppers • 4 Pulleys • 1 Fixed Bottom Guide • 2 Floating Bottom Guide • 1 Belt • Supporting Brackets and Accessories	1	SET	1,10,397/-
940.99.604	Top Track: 3600 mm	1	PC	7,704/-
940.99.830	Top Track for Fixed Panel : 3000 mm	1	PC	11,380/-
940.99.730	Trim Cover with Short Flap : 3000 mm	1	PC	5,429/-
940.99.732	Trim Cover with Long Flap : 3000 mm	1	PC	6,540/-
940.99.080	Trim Cover Support Track: 1000 mm	1	PC	673/-

