NEWFLAG
纽锋科技

INFORMATION & INSTALLATION MANUAL
FOR AUTOMATIC FLIP-UP FLOOD BARRIER

We reserve the right to upgrade the design to improve the performance or the installation convenience without advanced notice to customer.

ADVANTAGE:

1. No power or human labor required, fully driven by water itself);
2. Lightweight structure for manual operation;
3. Can be constructed in either ramp form sitting directly or ground or embedded form flush to ground.

PRODUCT SPECIFICATON:

FLOOD HEIGHT:

H0.6-H1.5meter to be customized as per request;

LENGTH:

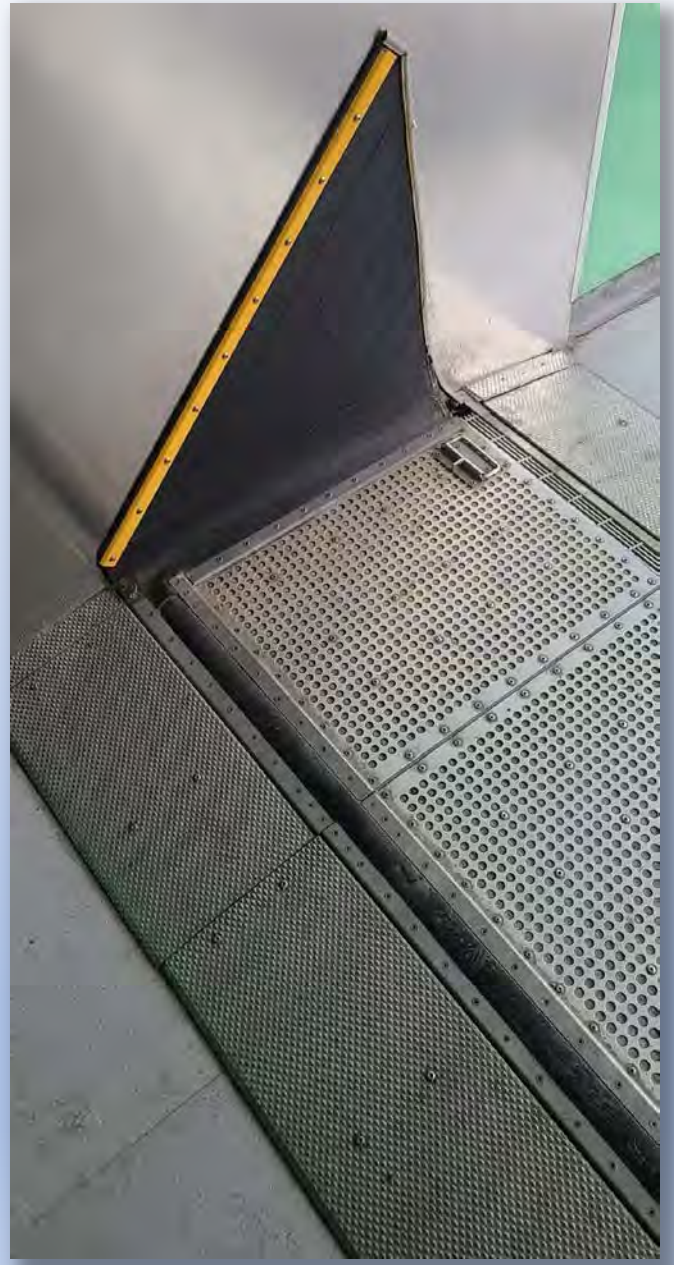
Fits the doorway width between side walls (Supply in module);

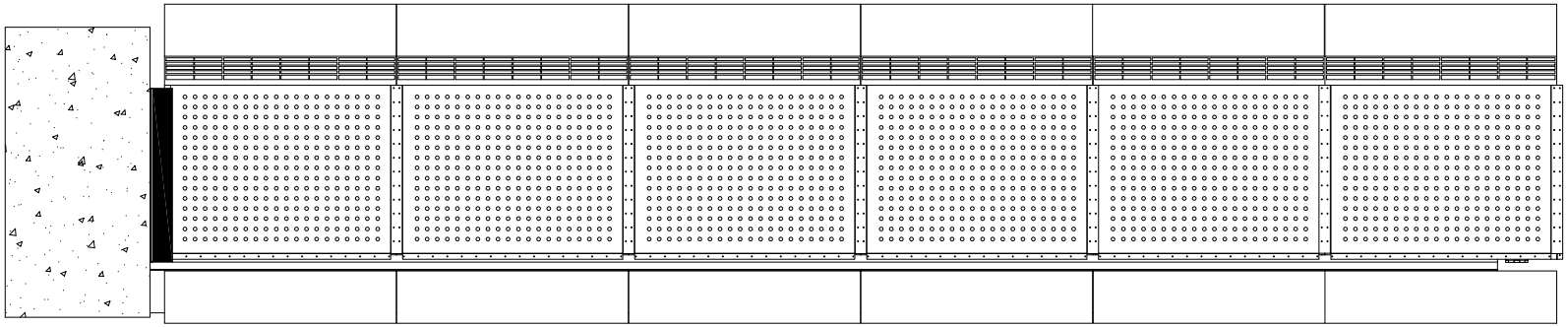
OVER-PASS WEIGHT:

Allow vehicle within 4.5 Metric Tons (higher strength can be customized if required).

REQUIREMENT:

1. Side Wall (to attach the end retaining rubber);
2. Flat ground plastering ±3mm;
3. Require ground slotting work for containing space if flush to ground is required.
4. Drainage inside the box can be considered to be pre-constructed before start the installation or prepare a small pump to drain the water inside after flood



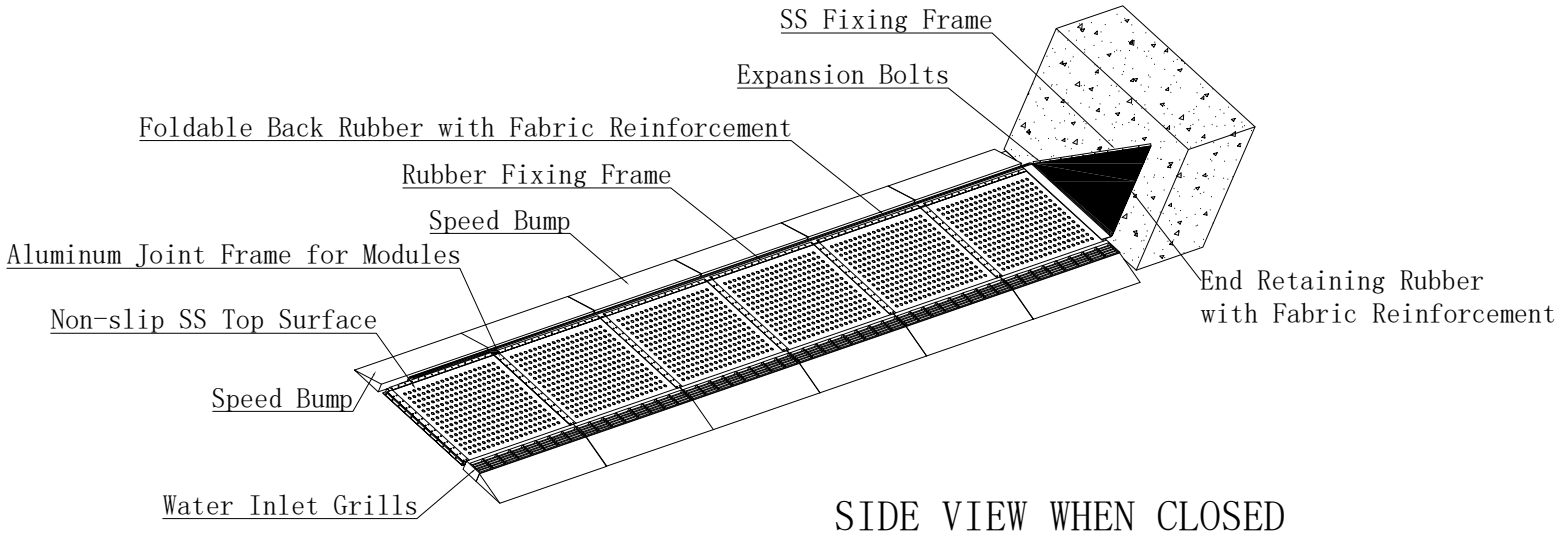


TOP VIEW WHEN CLOSED

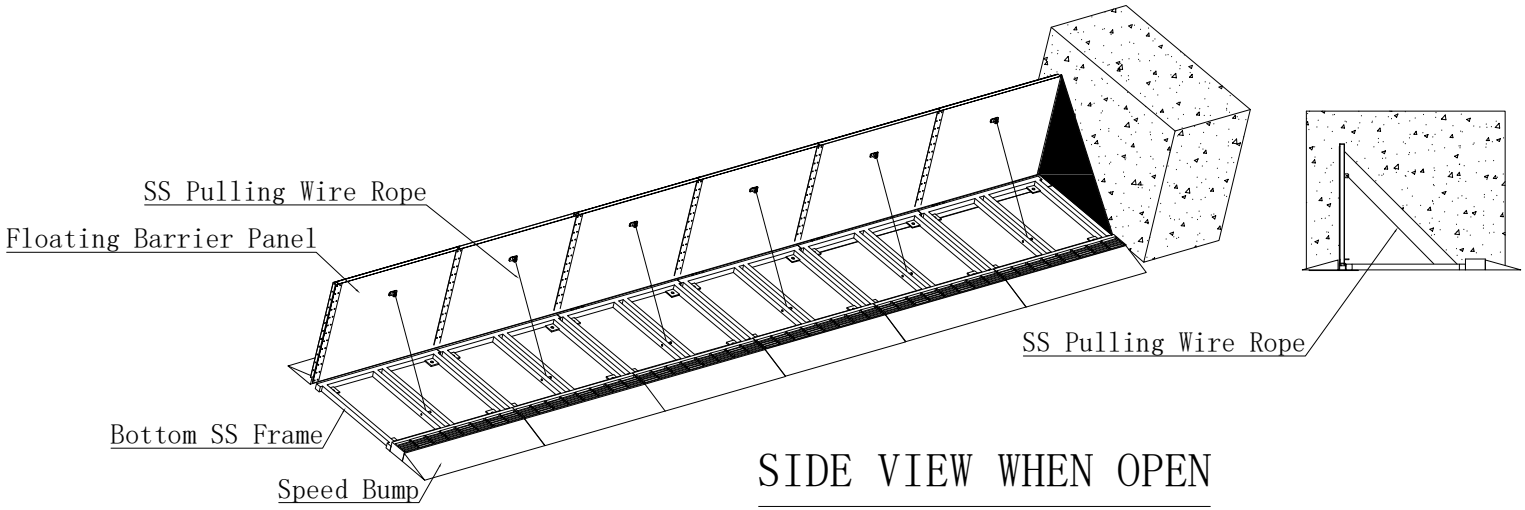
纽锋科技
NEWFLAG

NEWFLAG TECHNOLOGY CO., LTD.
Add.: 1803,Oriental Square, NO.777, Changjiang Rd., Jiangyin, Wuxi City, Jiangsu Province, China 214400.
TEL/FAX: +86 510 8617 8756
MOB.: +86 189 6162 8536
WEB.: www.flooddefend.com
E-MAIL: keanu@newflagtech.com

Design	Geo Guo	Unit: mm	AUTOMATIC FLOOD BARRIER (Hydrodynamic Water Driven)
		Scale: 1:1	
Edit	Keanu Lee	Date: SEP-07-2024	Drawing NO.: 1-CA-0710 Version 2.0



SIDE VIEW WHEN CLOSED



SIDE VIEW WHEN OPEN

纽锋科技
NEWFLAG

NEWFLAG TECHNOLOGY CO., LTD.
Add.: 1803,Oriental Square, NO.777, Changjiang Rd., Jiangyin, Wuxi City, Jiangsu Province, China 214400.
TEL/FAX: +86 510 8617 8756
MOB.: +86 189 6162 8536
WEB.: www.flooddefend.com
E-MAIL: keanu@newflagtech.com

Design	Geo Guo	Unit: mm Scale: 1:1	AUTOMATIC FLOOD BARRIER (Hydrodynamic Water Driven)
Edit	Keanu Lee	Date: SEP-07-2024	Drawing NO.: 2-CA-0710 Version 2.0

Bill of Materials		
ITEM	SPECIFICATION	FUNCTION
Floating Barrier Panel	Lmax.3000*Wmax.1500*T25mm PER MODULE	Floating Subject
Non-slip SS Sheet	T1.2mm	Anti-Slip
Alu. Joint Frame	W52*H28.5*1.7mm	Module Joint
Bottom Frame	SUS304L Square Tube 30*30*2mm	Structure Support
Speed Bump	H50*W100*L1000mm/PC	Low the vehicle speed
Water Inlet Grills	SUS304L H55*W50*1000mm/PC	Water inlet
Pulling Wire Rope	ϕ2.5mm SS Wire Rope	Prevent over-flip
Foldable Back Rubber	T5mm Fiber Reinforced Rubber	Water stop at width
Rubber Fixing Frame	SUS304L T2*20mm	Fixing on barrier panel
Expansion Bolts	SUS304L M10*100mm	Structure fixing on ground
End Retaining Rubber	T5mm Fiber Reinforced Rubber	Water stop at wall
Fixing Frame on Wall	SUS304L T5*W30*L	End rubber fix on wall

NEWFLAG Automatic Flood Barrier which is hydrodynamic driven by rising flood water itself, can be customized in module supply form according to the doorway width at site. It consists of the bottom frame,floating barrier panel with non-slip surface in module supply, and the end sealing rubber attached to the side wall.The rising or retreating flood water will flip up or close down the barrier panel automatically and it does not require power or human to intervene.It can be also manual lifted by an adult due to its lightweight technology. The structure is designed simple to reduce the risk of failure and easy to repair or replace the quick wearing spare parts.

Installation Technical Requirements: the overall installation accuracy is ±5mm, ground flatness requirements ≤3mm/m. According to the requirements of site, it can be constructed in ① Ramp form directly sitting on existing ground with speed bump attaching both sides (Product height when closed is approx.55-60mm above the ground); ② Embedded form with top surface flush to ground by slotting the ground for containing space.

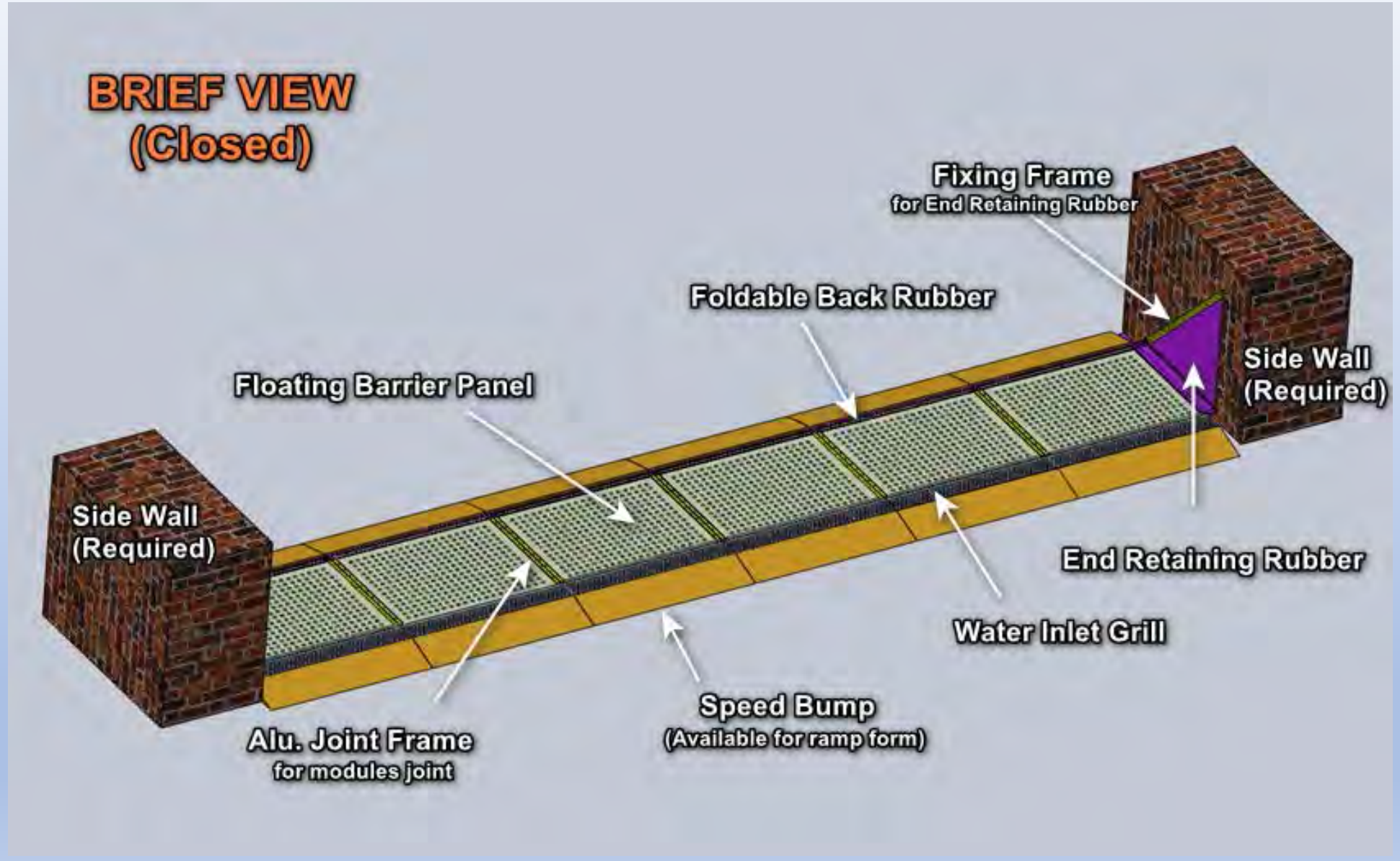
The weight of the lightweight barrier panel with great strength is about 18.5KGs/Square Meter which can withstand the crush of vehicle weights 4.2 metric tons. We can customize the barrier panel for the requirement even for container truck.

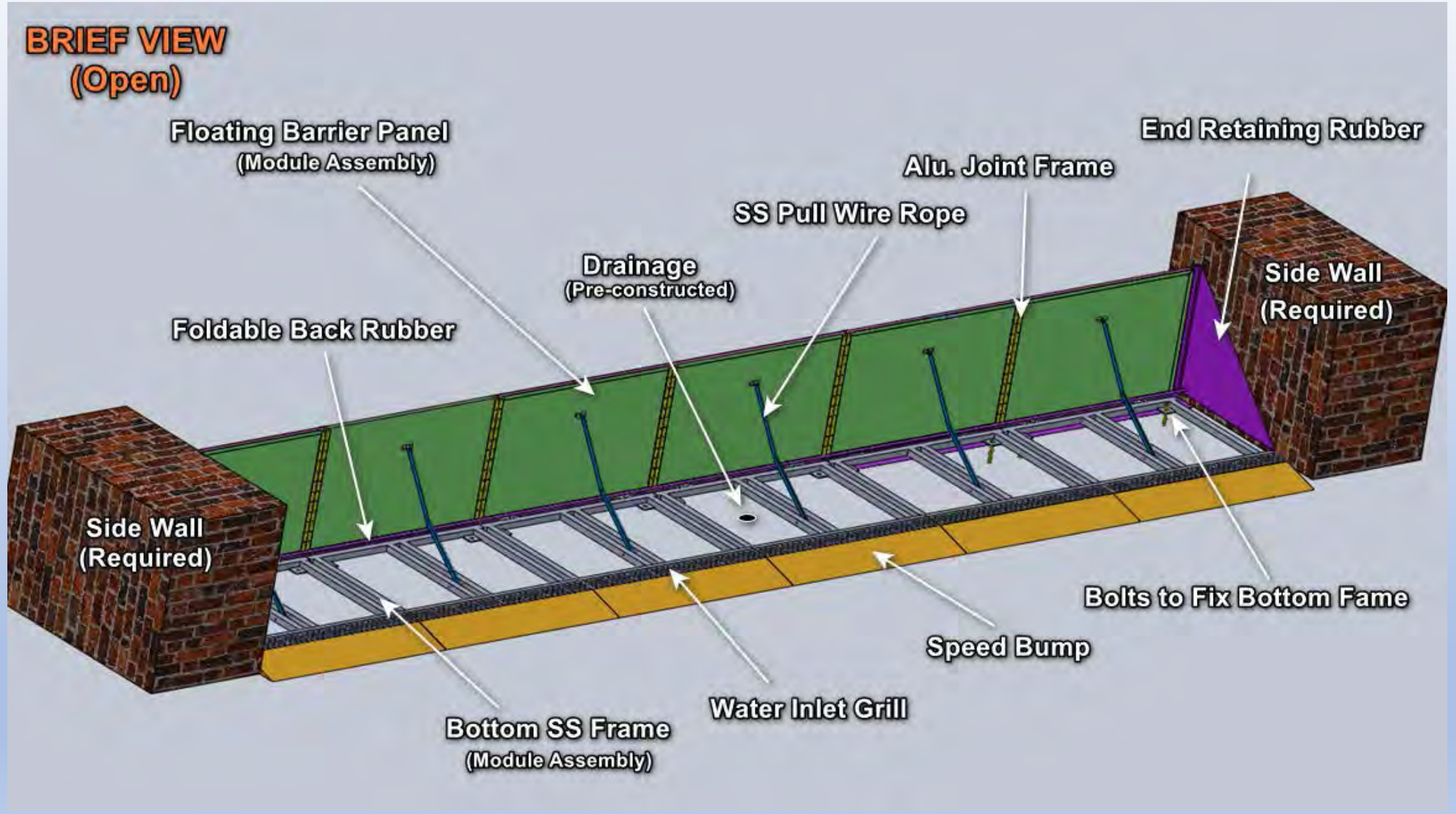
*Alarming system is optional if required.

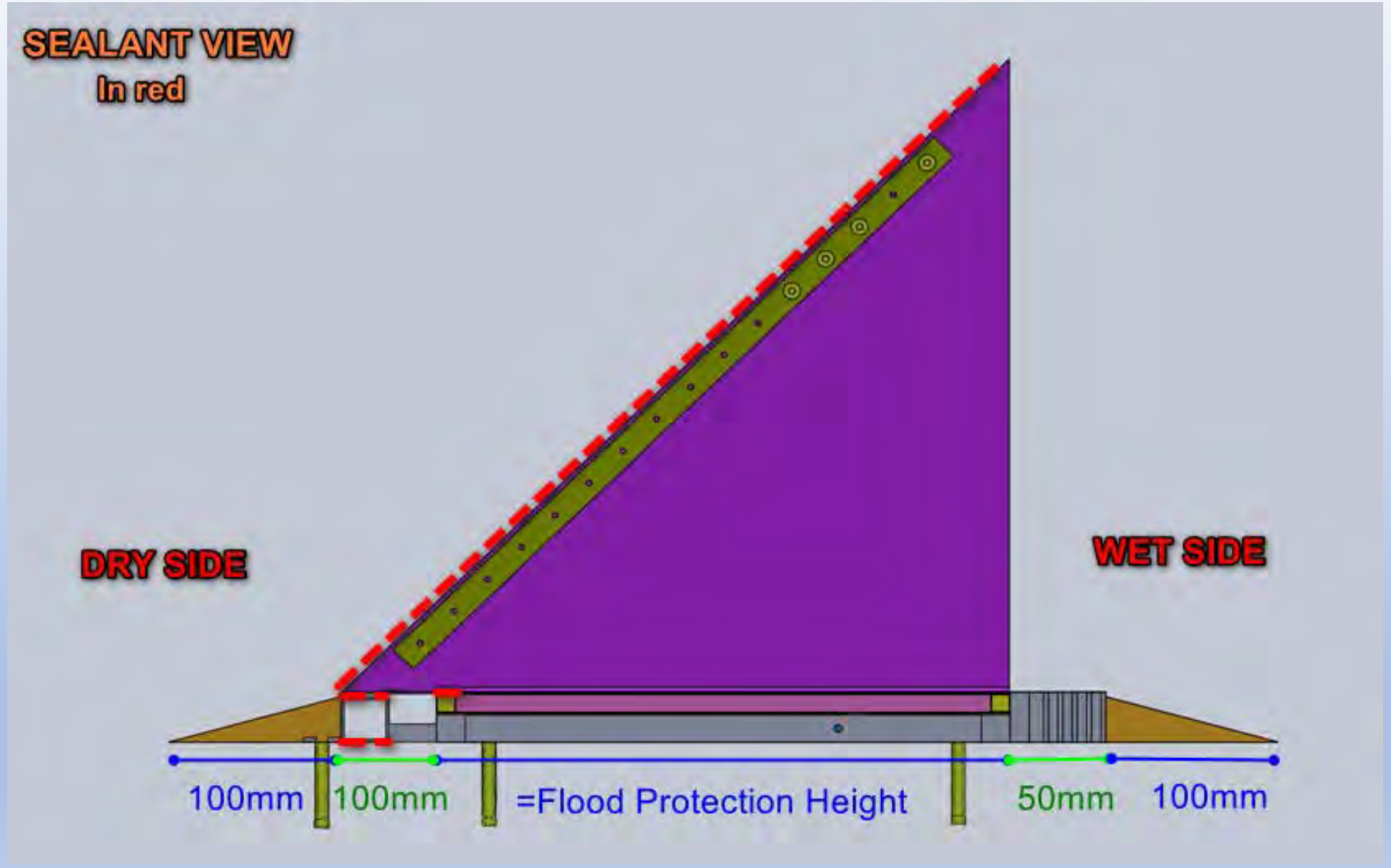
纽锋科技
NEWFLAG
NEWFLAG TECHNOLOGY CO., LTD.
Add.: 1803,Oriental Square, NO.777, Changjiang Rd., Jiangyin, Wuxi City, Jiangsu Province, China 214400.
TEL/FAX: +86 510 8617 8756
MOB.: +86 189 6162 8536
WEB.: www.flooddefend.com
E-MAIL: keanu@newflagtech.com

Design	Geo Guo	Unit: mm	AUTOMATIC FLOOD BARRIER (Hydrodynamic Water Driven)
		Scale: 1:1	
Edit	Keanu Lee	Date: SEP-07-2024	Drawing NO.: 3-CA-0710 Version 2.0

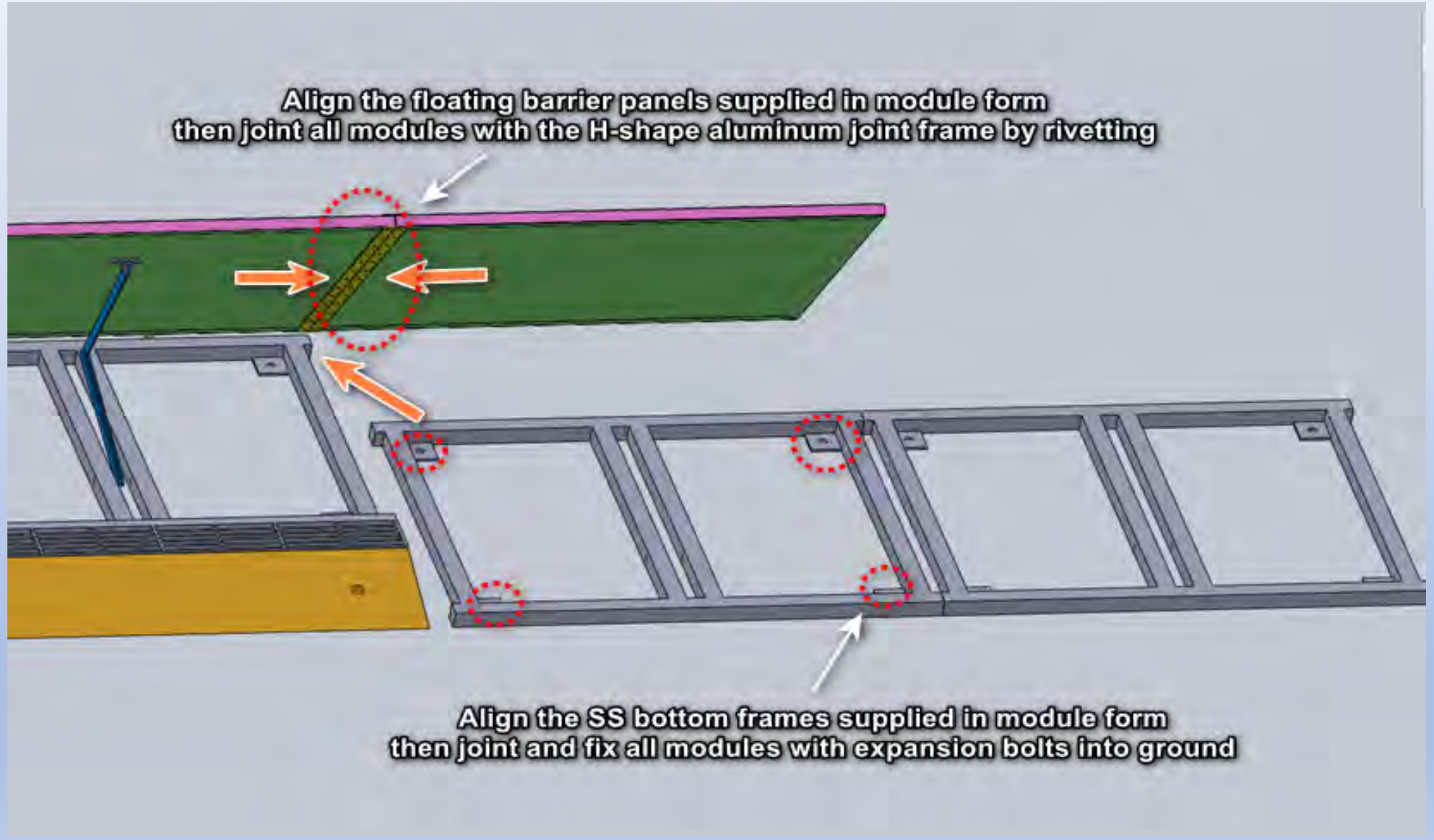
3D VIEW IN DIFFERENT ANGLES

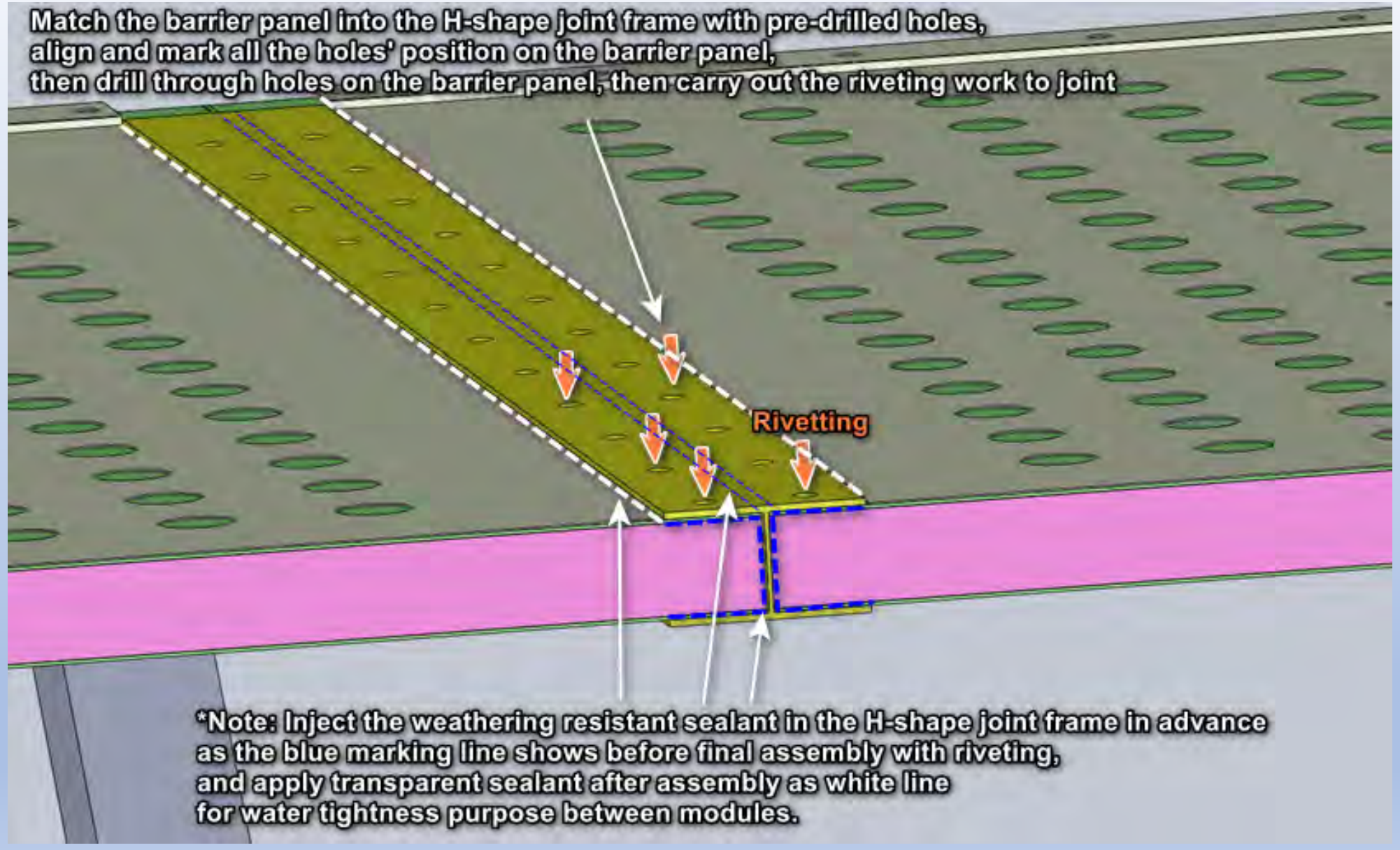


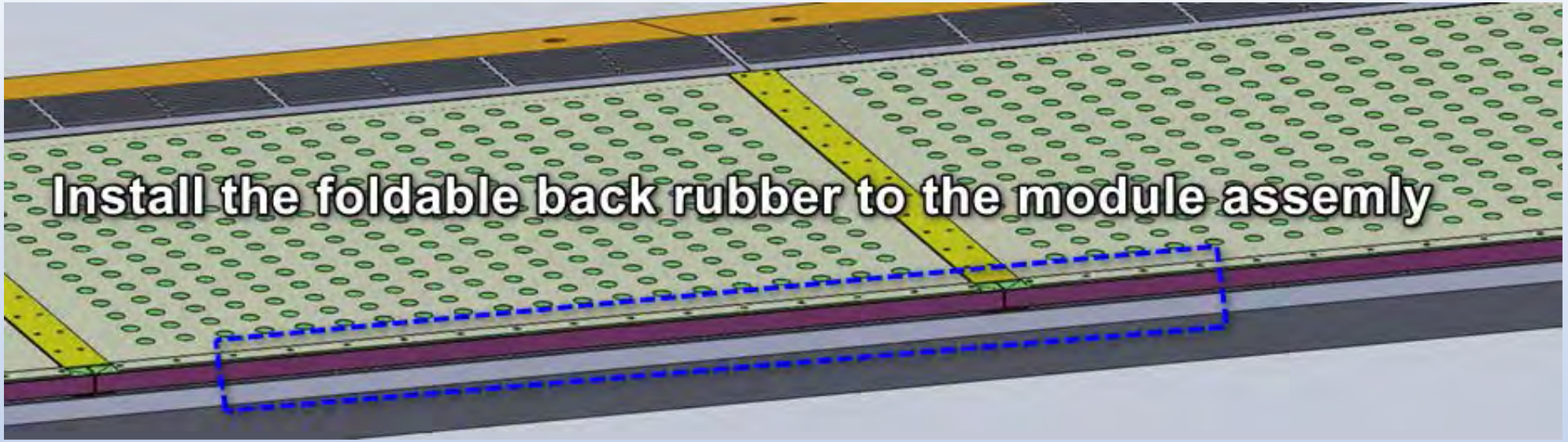




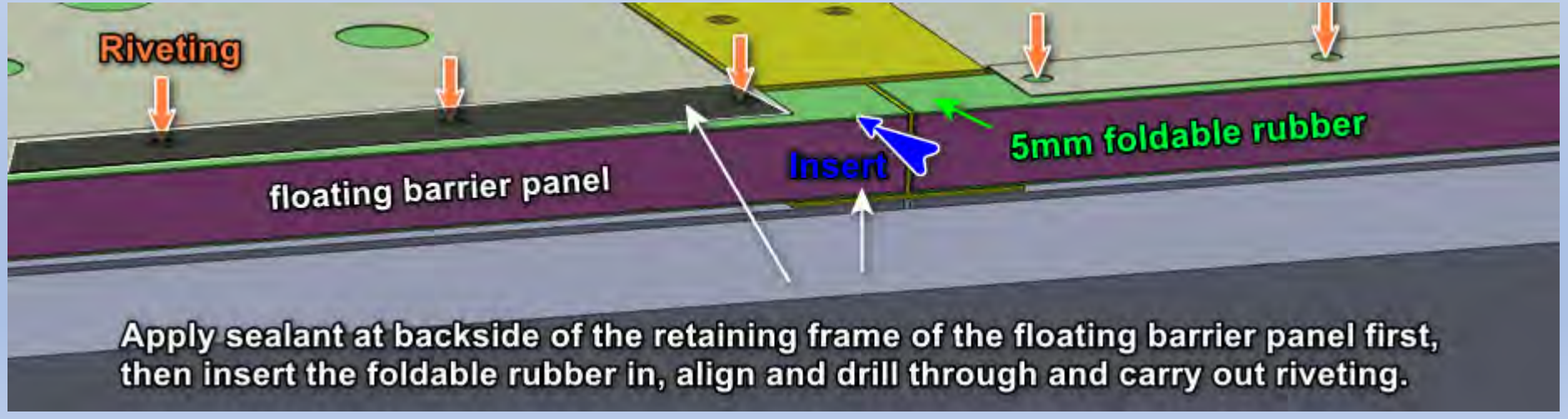
DETAILED INSTALLATION STEPS

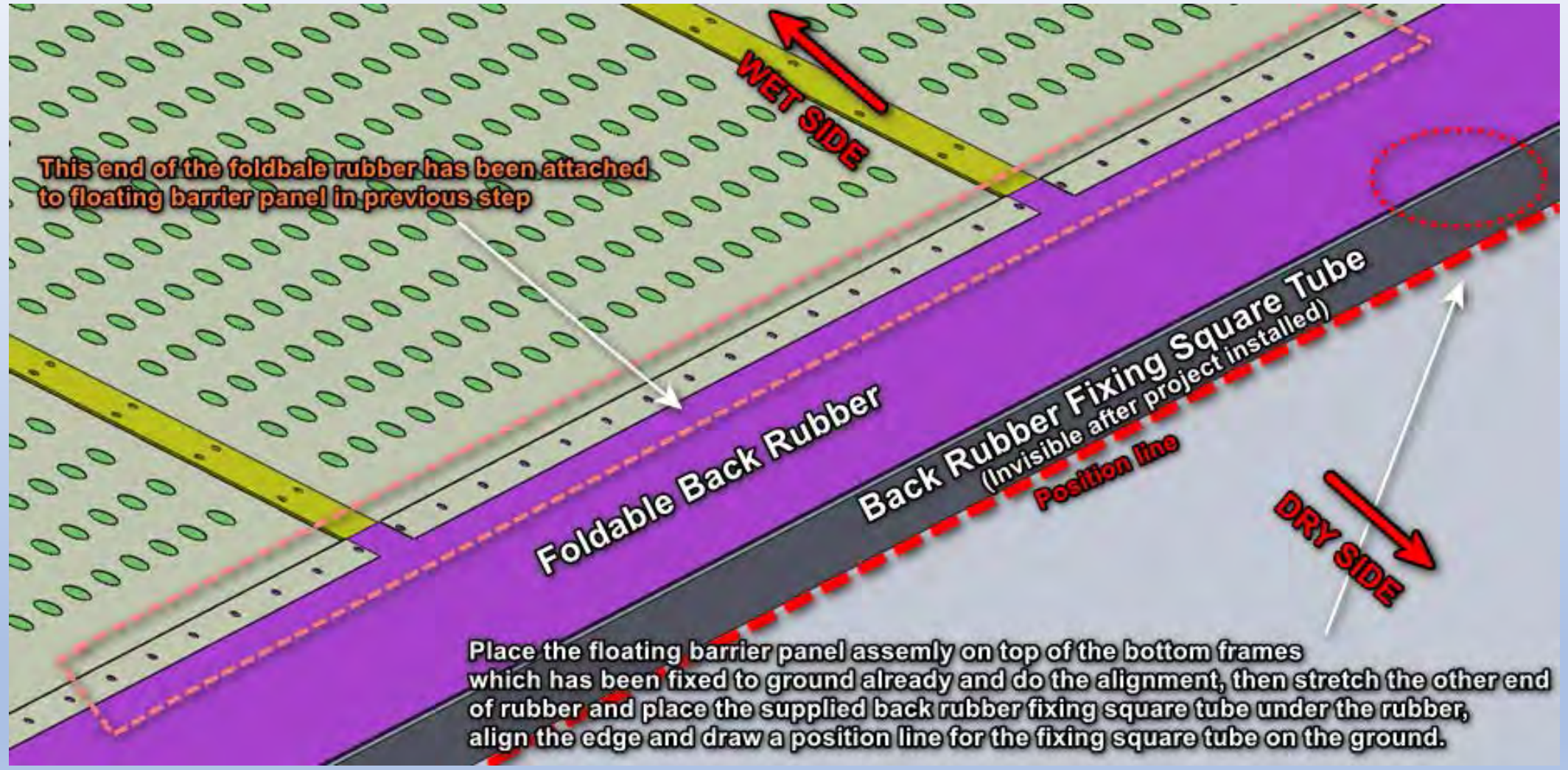


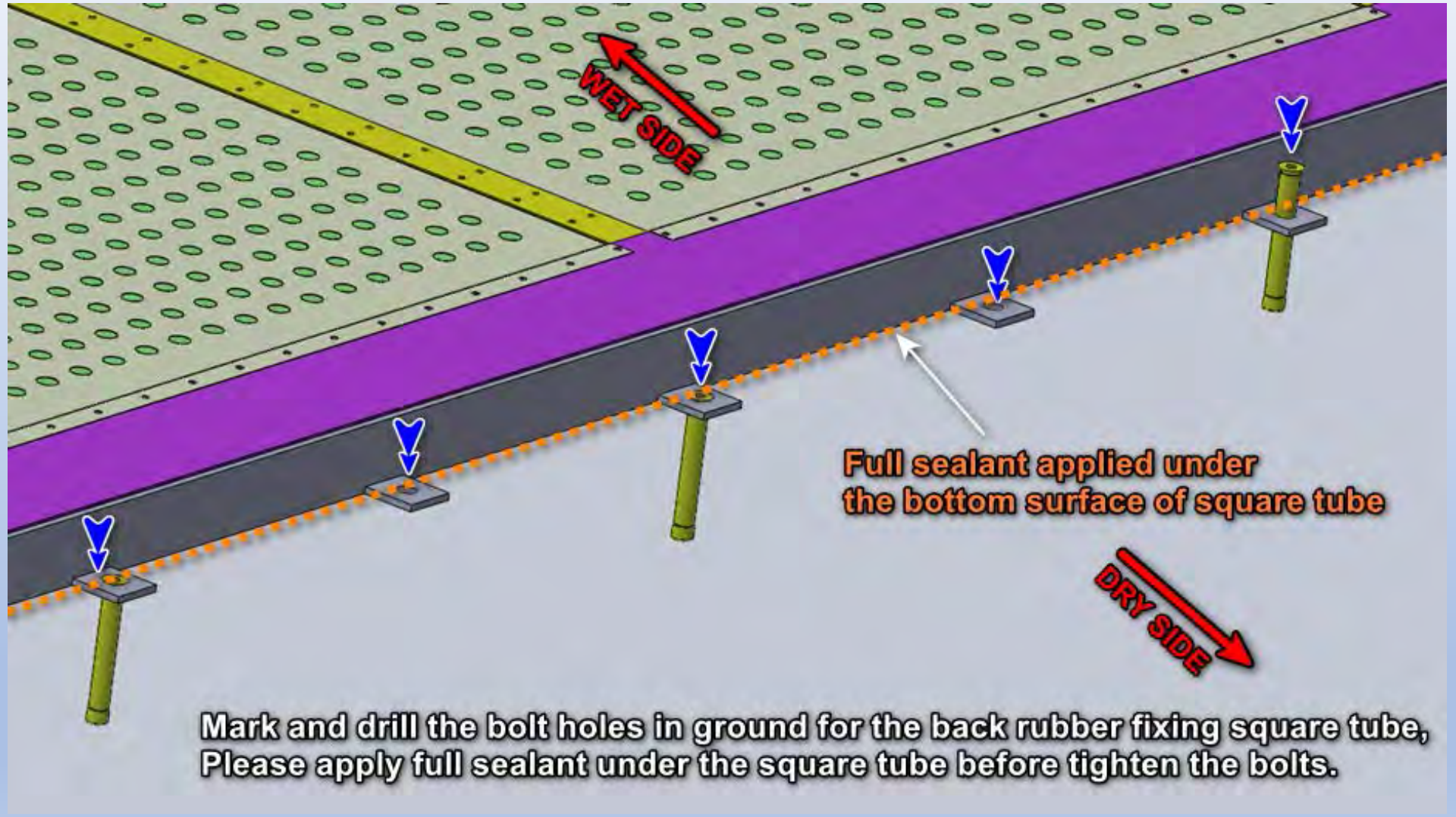


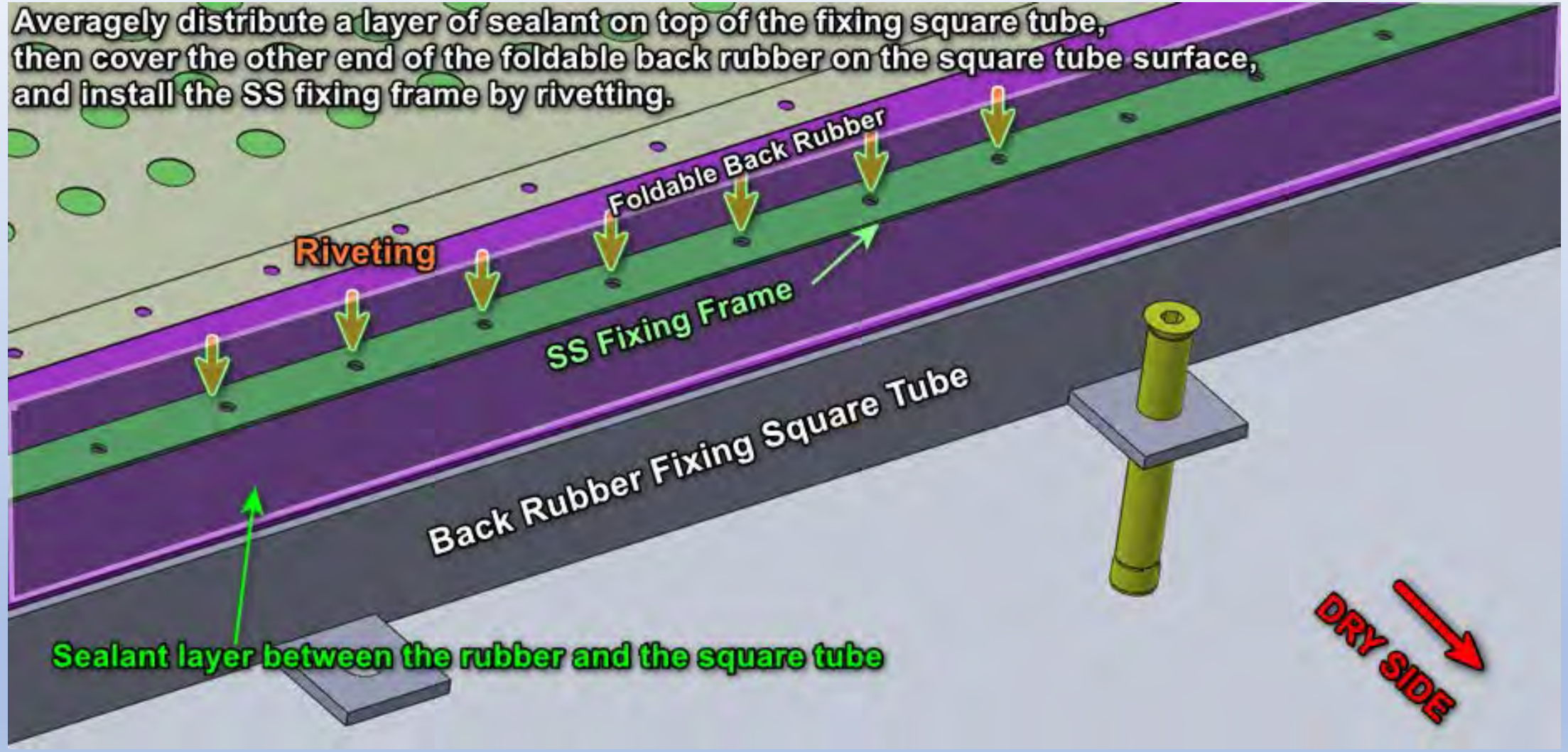


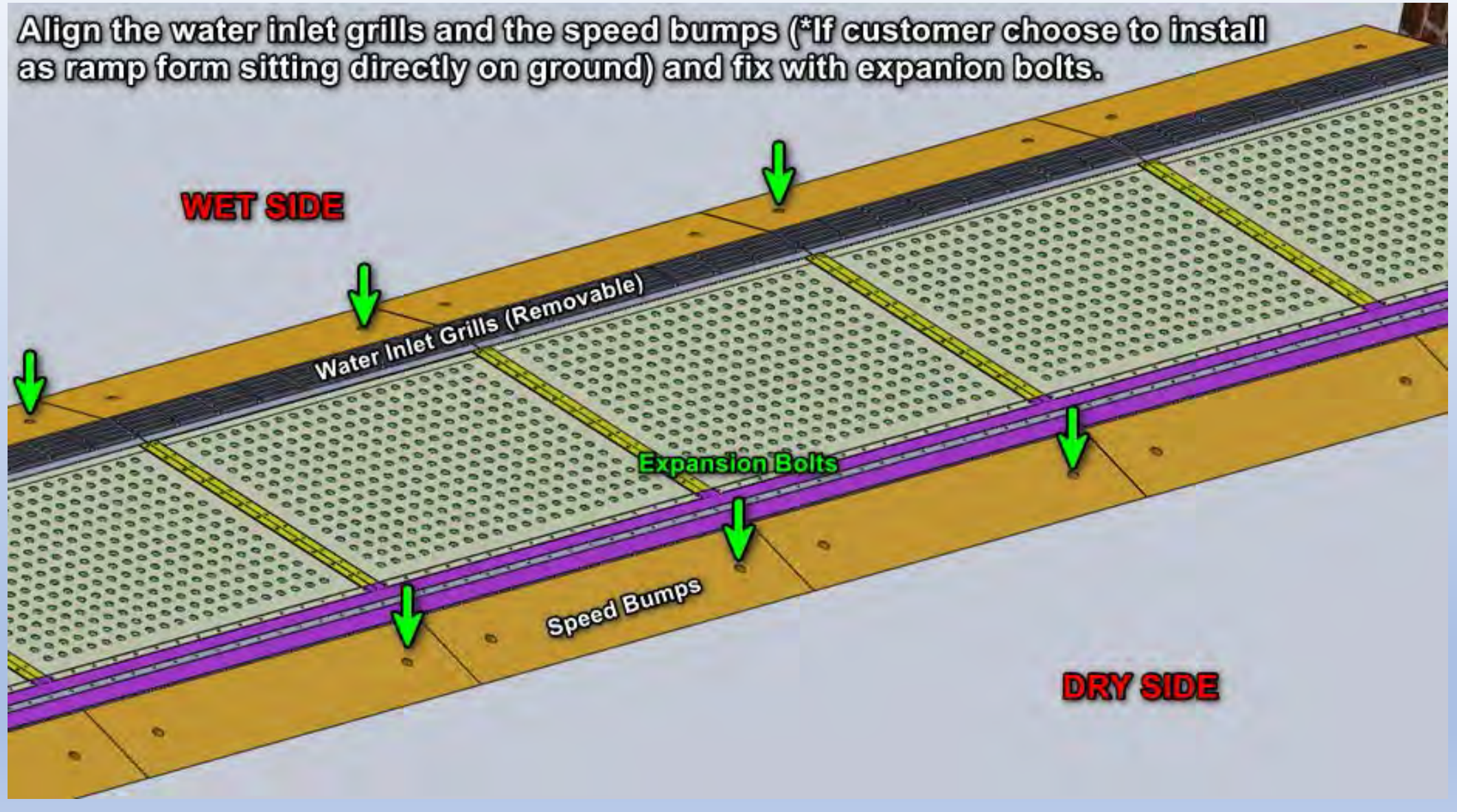
ENLARGED

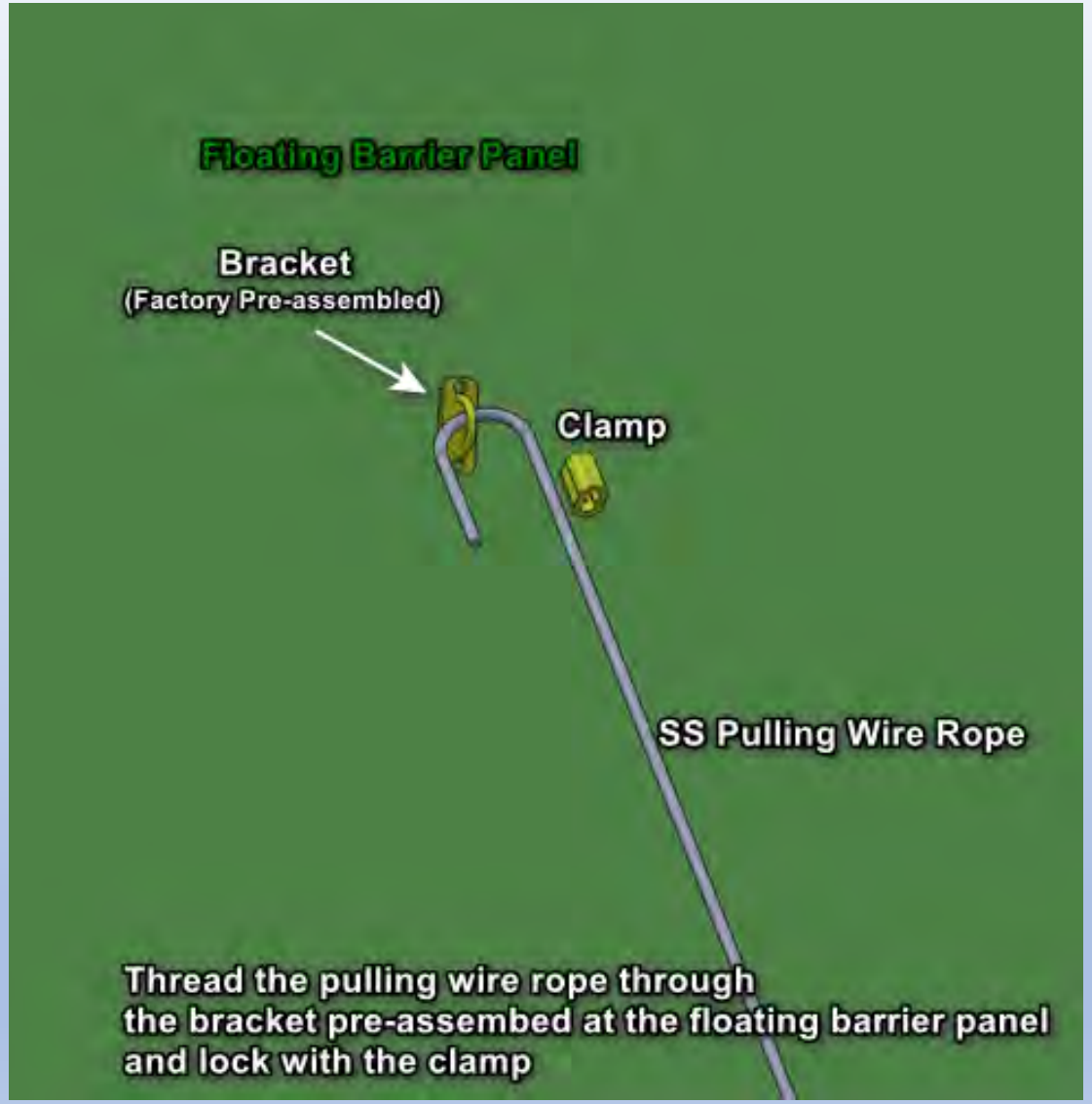


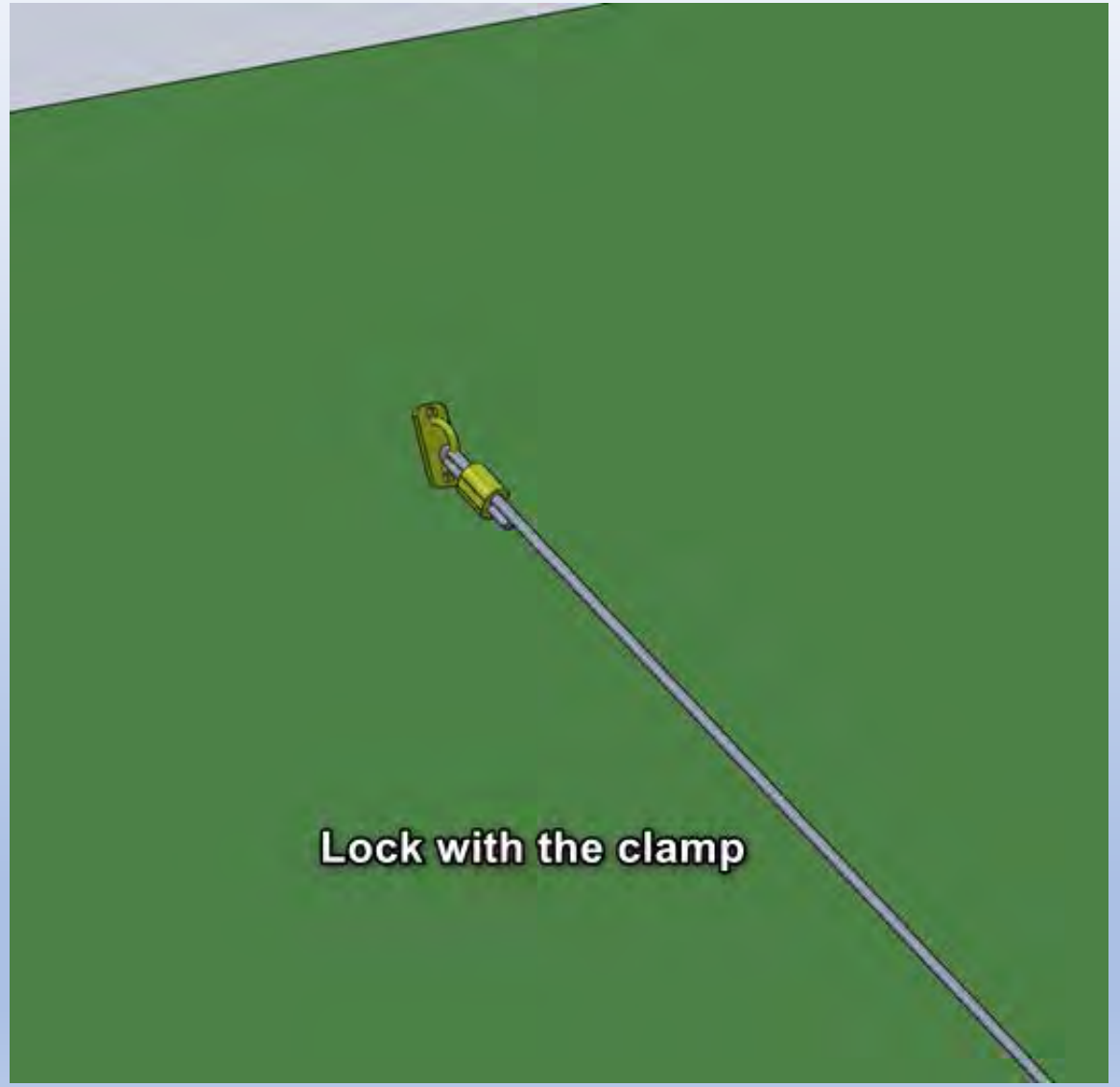


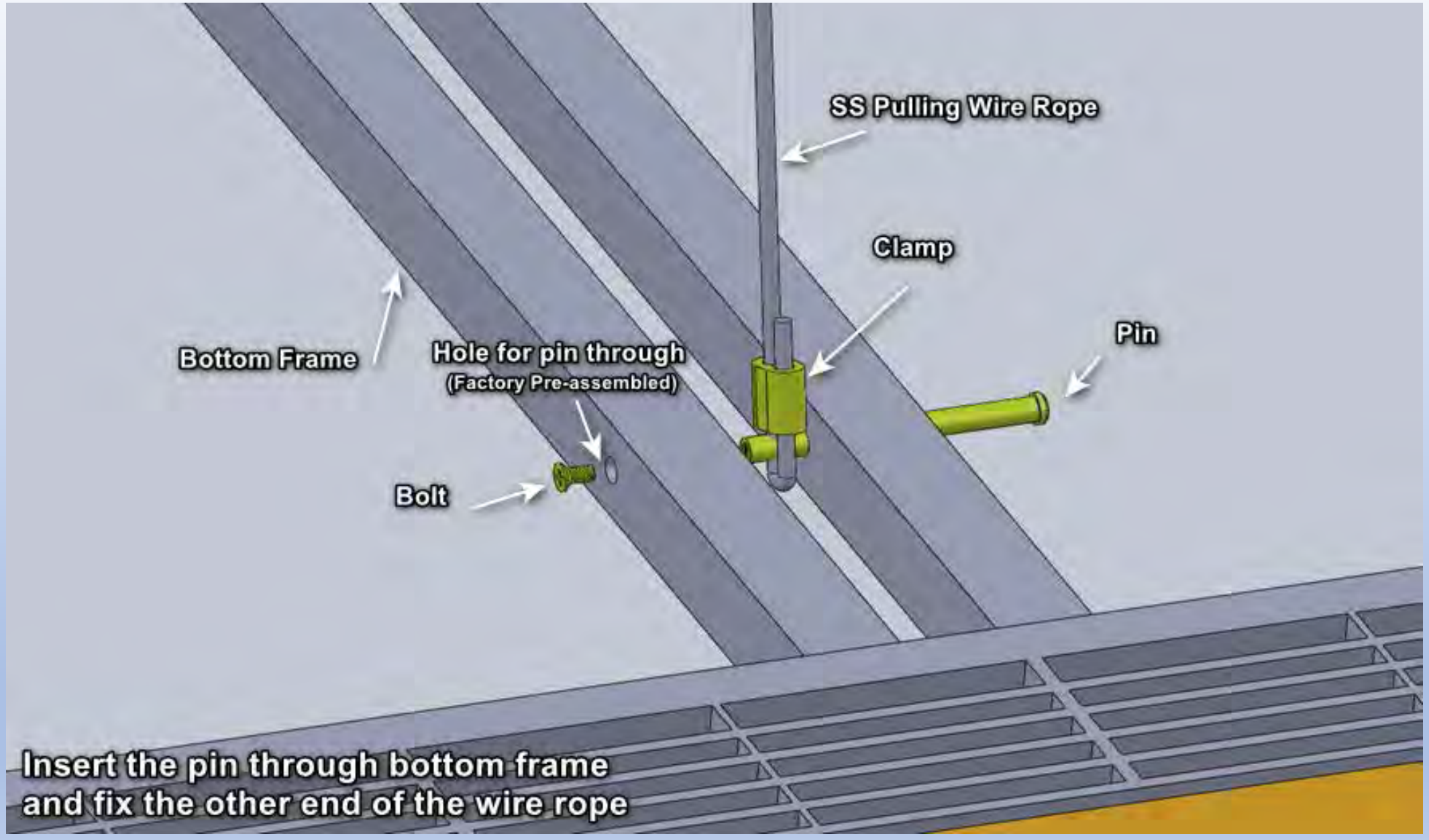




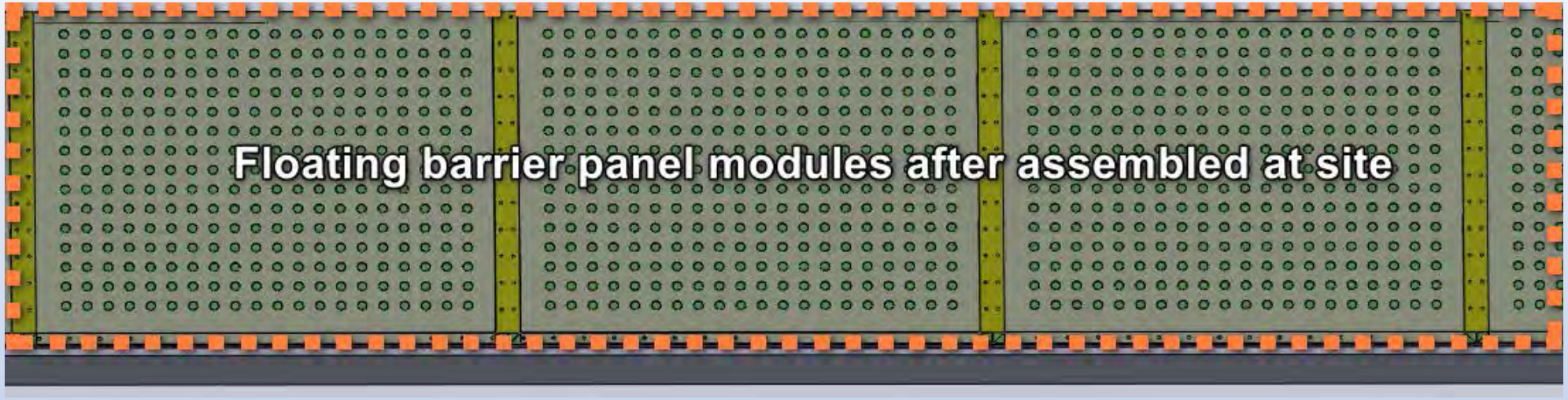








CLOSED VIEW AFTER MODULE ASSEMBLED



OPEN VIEW AFTER MODULE ASSEMBLED