

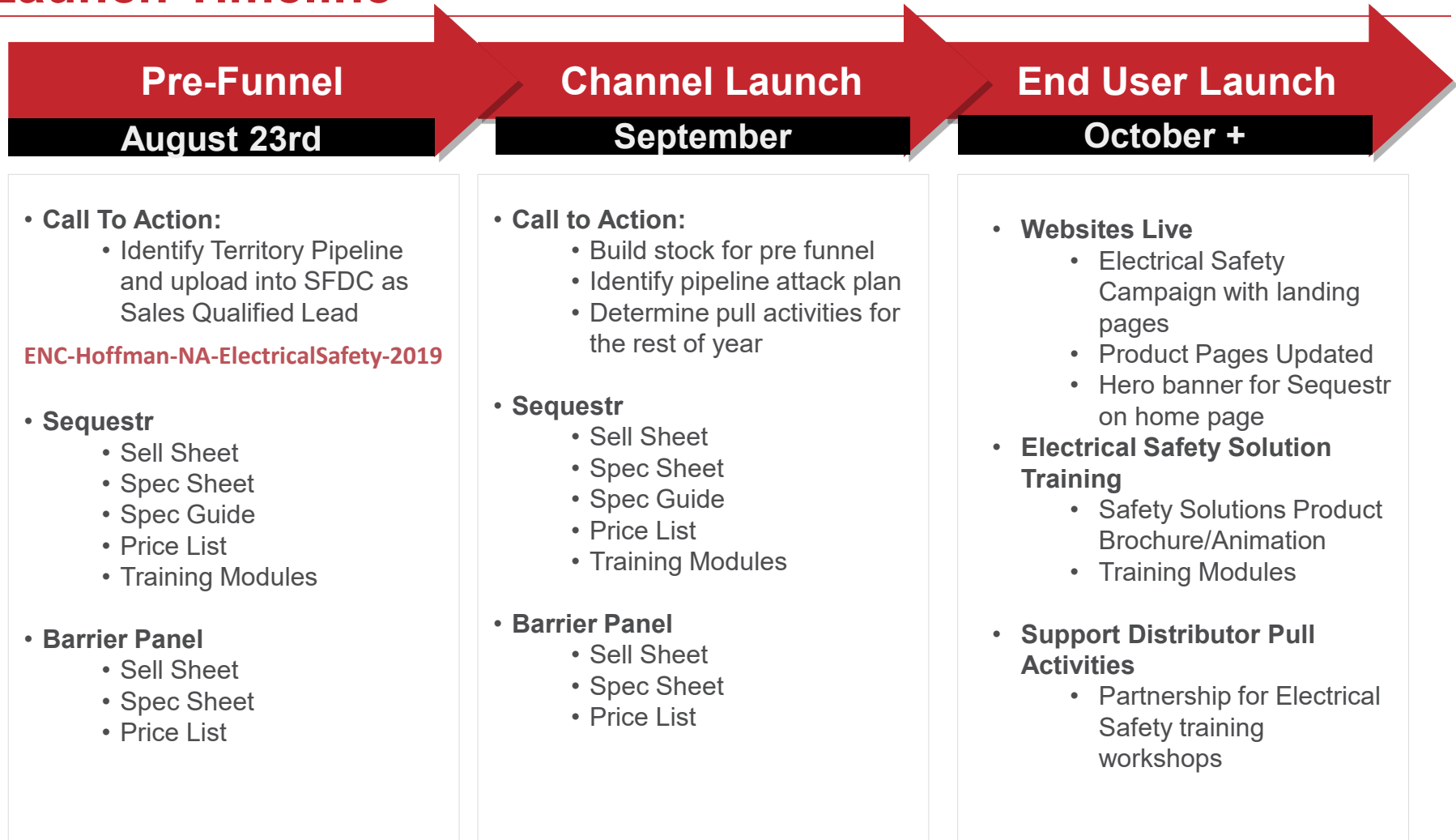
Sequestr and Barrier Panel Sales Training

John Turner – Global Product Manager

8/23/2019



Launch Timeline



Train and prepare sales before cultivating demand with full Safety campaign

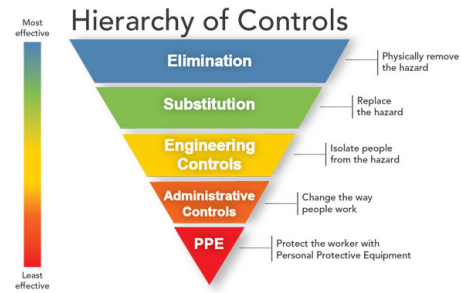
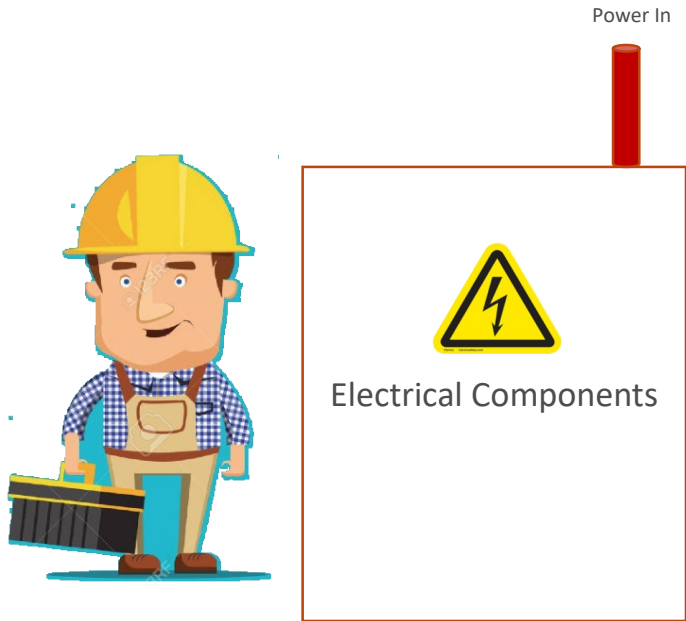
Obsolete current Sequestr and Packages by October 2020

Catalog Number	Cross Reference to New
AXD18	AXD341418
AXD20	Obsolete
AXD24	AXD341424

Catalog Number	Cross Reference to New
AXD18SS	AXD341418SS
AXD20SS	Obsolete
AXD24SS	AXD341424SS



Why do our customers care about these products?





Sequestr is an **Arc Flash Prevention Solution** that provides an extra level of protection to employees by **isolating the line side power of the disconnect in an external interlocked enclosure** eliminating the risk of **accidental contact** while doing routine maintenance in the main enclosure.

The Universal Barrier Panel is a simple solution to help reduce the risk of electrical hazards such as electrical shock or arc flash by adding a **Type 1 rated** physical barrier inside an enclosure to separate the high voltage from the low voltage components.



Sequestr + Barrier Panel provides the **greatest level of safety to keep employees safer and reduce maintenance and troubleshooting time** by separating high voltage and low voltage components, and Isolating line side power of the disconnect in HOFFMANs most common disconnect enclosures



Target Customers and Markets



Industrial Manufacturing – Automotive – Material Handling – Water and Wastewater – Petrochemical

➤ Drive Spec at Customers who

- Want to reduce risk to employees by preventing Arc Flash on existing equipment
- Ask about NFPA 70E or Prevention by Design
- Design out Arc Flash or High Voltage on new equipment
- Have been fined for not complying with OSHA standards
- Have had issues with competitive Barrier or Sequestr solutions
- Currently use safety switches or multiple enclosures that are not interlocked

➤ Specific Job Description to Target

- **EH&S and Maintenance Managers** – Care about following NFPA and OSHA standards and providing the safest work area for their employees by designing out Arc Flash Hazard when possible



nVent
Sequestr



Key Value and Features of Sequestr

1. Reduced Risk

Reduce risk of electric shock and arc flash during routine maintenance and troubleshooting allowing **reduced PPE requirements in main enclosure**

2. Reduced Maintenance Cost

Patented design streamlines routine maintenance and troubleshooting, while enhancing durability, reliability and longevity **reducing total cost of ownership**

3. Reduced Design Time

Broad portfolio isolates low to high amp disconnect switches & circuit breakers in mild steel & stainless steel large enclosures **reducing design time**

1 Padlocking handle for additional security



2 Robust door to door mechanical interlock provides dependable security reducing assembly time and maintenance costs

2 Compression stops and improved gasket geometry provides reliable environmental ratings

3 Mild Steel and Stainless Steel options providing Type 4X, 4, 12 and 3R ratings

3 Expanded size range can accommodate cable operated or variable rod operated disconnects from *30 AMPs to *800 AMPs

3 Can mount on **Bulletins A21, A21S4, A28, A28S4, A34, and A4L3D**

Allowed AMP rating is dependent on system design and NEC 430.10B standard. Depending on design, higher AMP breakers can be used

Future Sequestr Portfolio

Mild Steel, Type 3r, 12, 4

Low Amp



A28



A34

Stainless Steel, Type 4X, 12, 3R

Low Amp



A28S4

High Amp



A4L3D



A21



High Amp



A21S4

High Amp Sequestr and Added Bulletins Increase Sequestr Market

Mild Steel Sequestr

Mild Steel					
<p>Low Amp</p>  <p>AXD341412 AXD341418 AXD341424</p>					
	Bulletin	A21	A28	A34	A4L3D
<p>High Amp</p>  <p>AXD542018C AXD542024C</p>	Name	Two-Door with Floor Stands Disconnect Enclosure, Type 12	Heavy-Duty Free-Stand Disconnect Enclosure, Type 12	Modular Disconnect Enclosure, Type 12	Free-Stand Disconnect with Quick-Release Hinge, Type 4

Stainless Steel Sequestr

Stainless Steel			
<p>Low Amp</p>  <p>AXD18SS AXD20SS AXD24SS</p>			
	Bulletin	A21S4	A28S4
<p>High Amp</p>  <p>AXD542018SSC AXD542024SSC</p>	Name	Two-Door Enclosures for Flange-Mounted Disconnects, Type 4X	Heavy-Duty Free-Stand Enclosures for Flange-Mount Disconnects, Type 4X

Value Selling Sequestr



Panel Shops and Integrators

➤ Value - \$

Reduced installation time with confidence in finished product

➤ Features

Door To Door Interlock
Compression Stops
Dovetail Gasket

OEM

➤ Value - \$\$

Provides Arc Flash Prevention solution with reduced assembly costs and confidence in finished product to customer

➤ Features

Door to Door Interlock
Compression Stops
Dovetail Gasket
Expanded Bulletins and Sizes

End User

➤ Value - \$\$\$

Assurance of employee safety and equipment protection in disconnect applications with Arc Flash hazard

➤ Features

Padlocking Handle
Improved Interlock
Improved Gasket Seal
Expanded Bulletins and Sizes

Target Benefits to Specific Customer Groups



Barrier Panel



VALUE SELLING

CUSTOMER WANTS...

Reduce Risk

Reduce risk of electric shock and arc flash during routine maintenance and troubleshooting **reducing exposure to energized components**

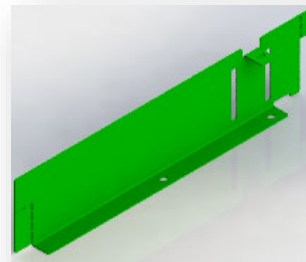


Barrier Panel Benefits

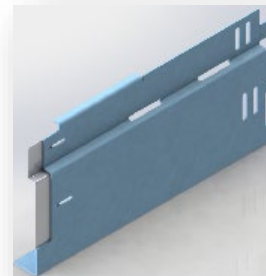
- Separate high voltage from low voltage when power on
- Full-depth separation with top and bottom barrier plate included to maximize protection



◀ Barrier Panel side view



◀ Barrier Panel top plate



◀ Barrier panel bottom plate

VALUE SELLING

CUSTOMER WANTS...

Reduced Maintenance Costs

Rely on superior performance through robust and tested designs that enhance durability, reliability and longevity, while **streamlining routine maintenance and troubleshooting**



Barrier Panel Benefits

- UL/NEMA Type 1 rated allows compartments to have separate PPE levels
- IP20 finger safe
- Reduces time to troubleshoot low voltage components



Simplify design with barrier panel for most large enclosures

- 34 Total SKUs, 17 different sizes
- Two finishes: white polyester powder paint or conductive
- Top & bottom plate and hardware included
- Designed to fit in unibody, free-stand or floor-mount enclosures with centerpost

Painted Catalog Nbr	Conductive Catalog Nbr	H in.	D in.	W in.	Fits Enclosure Height and Depth in.	Gauge thickness
A60BP12	A60BP12G	59.8	11.8	2.6	60x12	14
A60BP18	A60BP18G	59.8	17.8	2.6	60x18	14
A60BP24	A60BP24G	59.8	23.8	2.6	60x24	14
A62BP10	A62BP10G	61.8	9.8	2.6	62x10	14
A62BP12	A62BP12G	61.8	11.8	2.6	62x12	14
A62BP18	A62BP18G	61.8	17.8	2.6	62x18	14
A72BP12	A72BP12G	71.8	11.8	2.6	72x12	14
A72BP18	A72BP18G	71.8	17.8	2.6	72x18	14
A72BP24	A72BP24G	71.8	23.8	2.6	72x24	14
A74BP12	A74BP12G	73.8	11.8	2.6	74x12	14
A74BP18	A74BP18G	73.8	17.8	2.6	74x18	14
A74BP24	A74BP24G	73.8	23.8	2.6	74x24	14
A84BP18	A84BP18G	83.8	17.8	2.6	84x18	14
A84BP24	A84BP24G	83.8	23.8	2.6	84x24	14
A90BP18	A90BP18G	89.8	17.8	2.6	90x18	14
A90BP20	A90BP20G	89.8	19.8	2.6	90x20	14
A90BP24	A90BP24G	89.8	23.8	2.6	90x24	14







Full depth separation in one part number

Enclosures that work with Barrier Panels

MILD STEEL

Enclosure Type	Two-Door with Floor Stands Disconnect Enclosure, Type 12	Heavy-Duty Free-Stand Disconnect Enclosure, Type 12	Free-Stand Disconnect with Quick-Release Hinge, Type 4	Two-Door with 3-Point Latches and Floor Stands, Type 4	Two-Door with Floor Stands, Type 4
Bulletin	A21	A28M2, A28MM	A4L3D	A4L3	A4L
Image					
Note	Will not work on CPX enclosures				

STAINLESS STEEL

Enclosure Type	Two-Door Enclosures for Flange-Mounted Disconnects, Type 4X	Heavy-Duty Free-Stand Enclosures for Flange-Mount Disconnects, Type 4X	General Purpose Two-Door Floor-Mount Disconnect Enclosures, Type 4X	General Purpose Two-Door with Quarter-Turn Latches and Floor Stands, Type 4X	Two-Door with 3-Point Latches, Type 4X	Two-Door with Floor Stands, Type 4X
Bulletin	A21S4	A28S4	A4S2	A4S2	A4S3	A4SL
Image						
Note	Will not work on CPX enclosures					

Selling Points Against Competition

SEQUESTR	BARRIER PANEL
<p style="text-align: center;">Saginaw</p> <ul style="list-style-type: none"> • 800A range vs 200A • Works on multiple large enclosures • Robust door-door interlock VS rod operated • Padlock handle included • 3PT latch Vs quarter turn latch 	<p style="text-align: center;">Saginaw</p> <ul style="list-style-type: none"> • UL/NEMA Type 1 Rated Vs None • Includes top and bottom barrier • Galvanized option available
<p style="text-align: center;">Eaton</p> <ul style="list-style-type: none"> • Uses breakers from multiple manufacturers • 800A range vs 600A • Robust door-door interlock VS cable • Padlocking handle included • 3 PT latch vs screw clamp 	<p style="text-align: center;">Modular</p> <ul style="list-style-type: none"> • Same barrier performance in a unibody design
<p style="text-align: center;">Safety Switches</p> <ul style="list-style-type: none"> • Interlocks with main enclosure • Maintains type rating 	

ACCESSORIES IN ACTION



Add an **IR window** to perform thermal auditing of energized components without opening the door



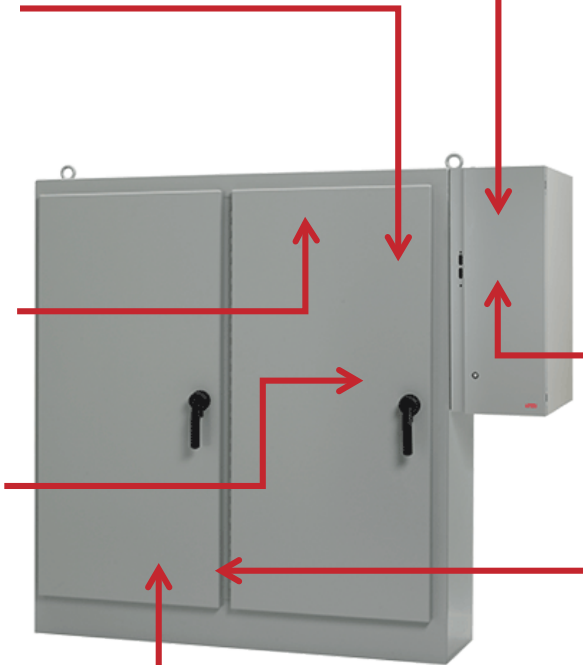
Add a **door stop** to prevent door from swinging back and causing accidental contact with components on door



Add an **INTERSAFE data port** to allow access to programming devices without opening the door



Add an **external data pocket** to store system documents outside of the enclosure to prevent opening the door



Add a **SEQUESTER external disconnect enclosure** to remove the line side of the disconnect switch, which remains energized even after power is turned off, from the main enclosure

Add a **regular window** to provide visual inspection into the enclosure to ensure disconnect contacts are open

Add a **barrier** to separate high and low voltage equipment to allow access to low voltage compartment without exposure to high voltage compartment

