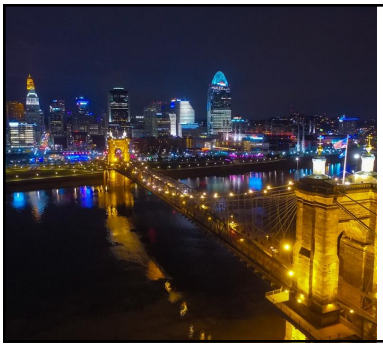


TriHealth

MIDWESTERN VASCULAR

Percutaneous Thrombectomy of Pulmonary Embolism & Deep Venous Thrombosis – Tips & Tricks with FLASH

- Patrick E. Muck MD, RVT

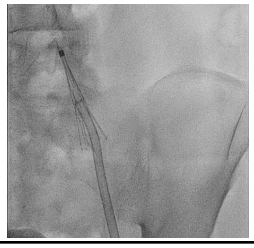
Trihealth – Good Samaritan Hospital

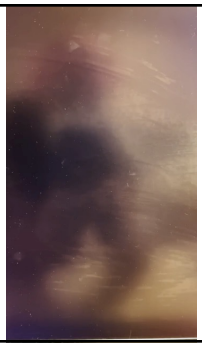
Cincinnati, Ohio

Disclosures

- BD/Bard – Speaker's bureau
- Penumbra – Speaker's bureau
- Boston Scientific – MAB
- Abbott – Speaker's bureau
- Biotex – Speaker's bureau
- ICHOR – Speaker's Bureau

Lightning 12 & Flash: Intermittent & Powerful Aspiration





These Devices are Effective

Lightning 12

12 French

Technical Success and Short-Term Results with Computer aided Mechanical Aspiration Thrombectomy for Lower Extremity Iliofemoral Deep Vein Thrombosis

>96% Single Session!

Department of Vascular Surgery
John J. Cranley Vascular Laboratory
Good Samaritan Hospital,
TriHealth Inc.
Cincinnati, Ohio, USA

Dual Clot Detection and MaxID Technology

Dual Clot Detection Algorithms

Pressure differential and flow-based algorithms designed for:

Quicker clot detection*

Quicker patent flow detection to reduce potential blood loss*

"Gallop Mode"

MaxID Technology

Comparable to IDs of large-bore catheters while maintaining a lower profile

Lightning Flash 2.0

Next-Gen Software for the Removal of Venous Thrombus and the Treatment of PE

Designed for:

Optimized valve cadence for thrombus removal

"Gallop Mode"

Enhanced algorithmic sensitivity with optimal catheter profile

Streamlined audio-visual cues

Updated Flow

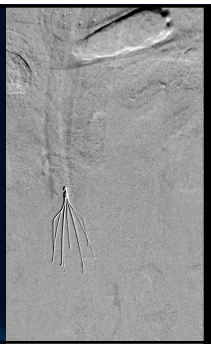
Lightning Flash 1.0

Sampling	Clot Detection/Removal	Flash Mode
Clicking	Clicking/No Clicking	Rapid Clicking

Sampling	Gallop Mode
Clicking	Clicking

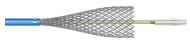
Complicated Cases??

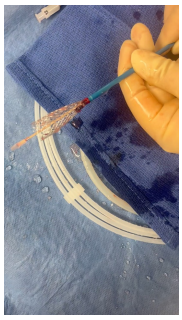
SupraRenal Thrombus Extension?



Suprarenal Protection..

22 x 70 WallStent….





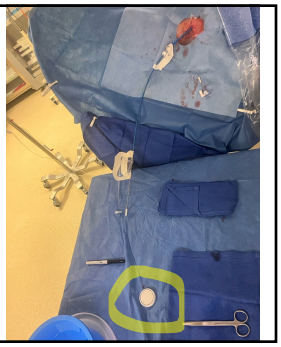
Suprarenal Protection..

Right IJ Approach

10 French

260cm Amplatz

WireWatch – Wire securing device



Right FV Open

Supine

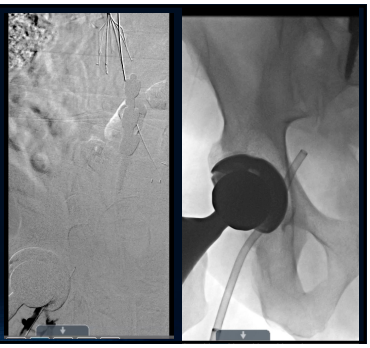
16x33 Gore Dryseal

Pen FLASH 16 fr system

Pen FLASH 16 fr system

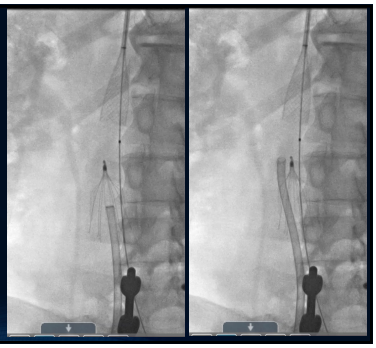
Right CFV

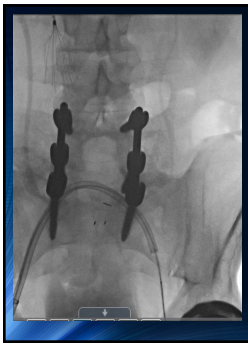
Right EIV/CIV



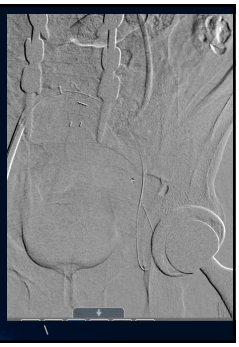
FLASH Safe Through IVF

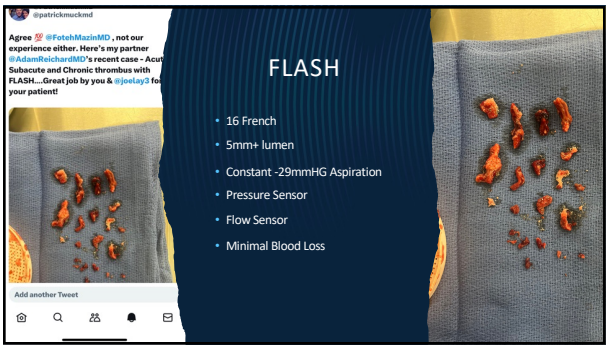
Clear out WallStent
(if anything even in it)

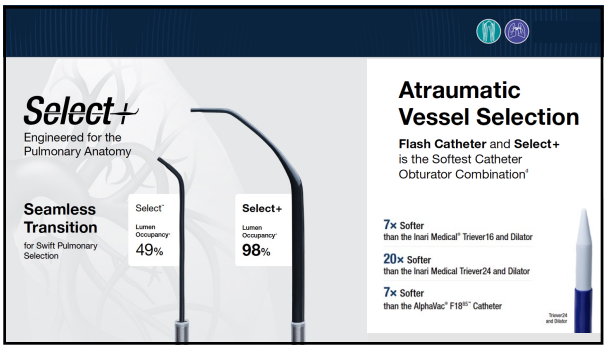


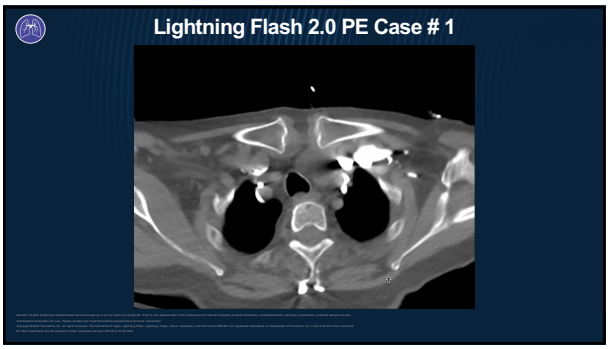


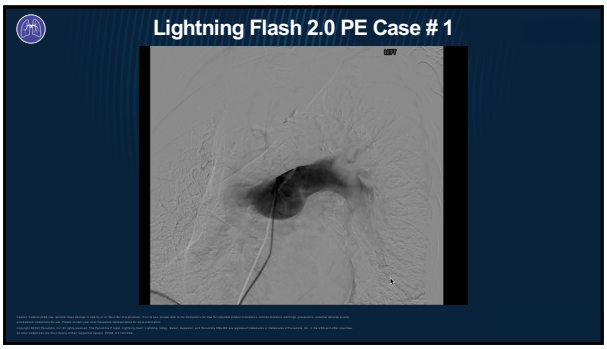
Up & Over

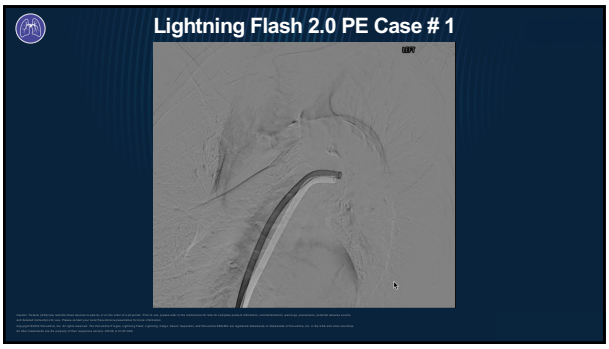


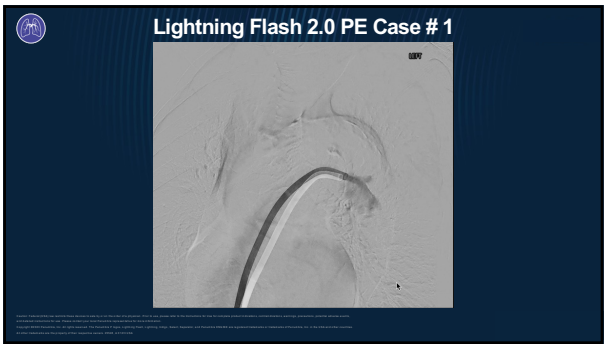

@patrickmuckmd
Agree 💯 @FotehMazinMD , not our experience either. Here's my partner @AdamReichardMD's recent case - Acut
Subacute and Chronic thrombus with FLASH....Great job by you & @joelay3 fo
your patient!
Add another Tweet
FLASH
16 French
5mm+ lumen
Constant -29mmHG Aspiration
Pressure Sensor
Flow Sensor
Minimal Blood Loss

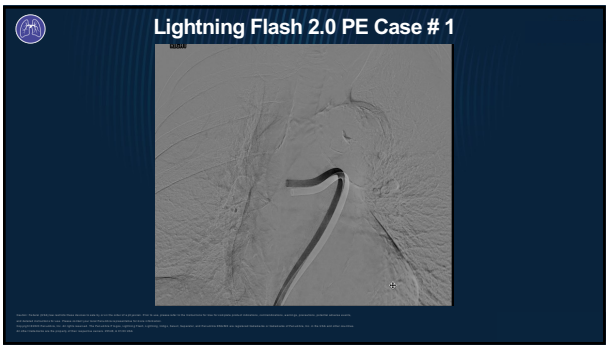

Select+
Engineered for the Pulmonary Anatomy
Seamless Transition
for Swift Pulmonary Selection
Select+
Lumen Occupancy
98%
Atraumatic Vessel Selection
Flash Catheter and Select+ is the Softest Catheter Obturator Combination*
7× Softer
than the Inari Medical® Triever16 and Dilator
20× Softer
than the Inari Medical Triever24 and Dilator
7× Softer
than the AlphaVac® F18EC® Catheter

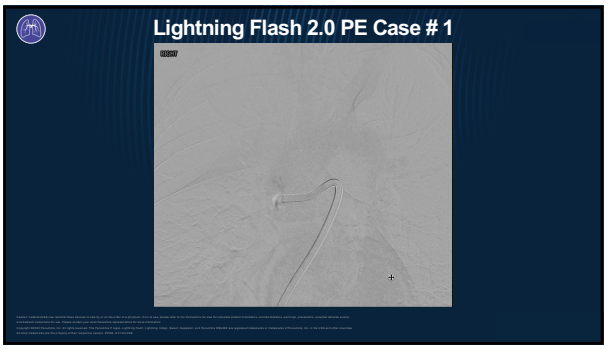

Lightning Flash 2.0 PE Case # 1

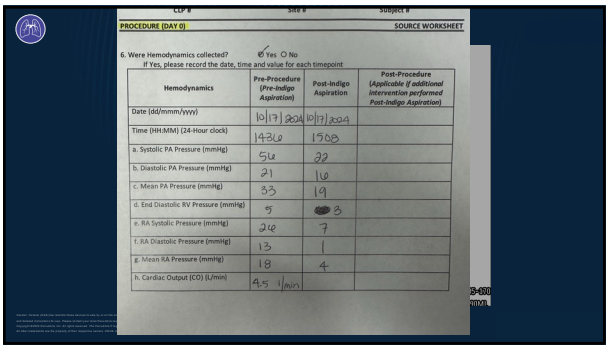

Lightning Flash 2.0 PE Case # 1


Lightning Flash 2.0 PE Case # 1


Lightning Flash 2.0 PE Case # 1






PROCEDURE (DAY 0) SOURCE WORKSHEET

6. Were Hemodynamics collected? ✓ Yes ○ No
If Yes, please record the date, time and value for each timepoint

Hemodynamics	Pre-Procedure (Pre-Indigo Aspiration)	Post-Indigo Aspiration	Post-Procedure (Applicable if additional intervention performed Post-Indigo Aspiration)
Date (dd/mmm/yyyy)	10/17/2024	10/17/2024	
Time (HH:MM) (24-Hour clock)	1436	1508	
a. Systolic PA Pressure (mmHg)	50	32	
b. Diastolic PA Pressure (mmHg)	21	16	
c. Mean PA Pressure (mmHg)	33	19	
d. End Diastolic RV Pressure (mmHg)	5	3	
e. RA Systolic Pressure (mmHg)	20	7	
f. RA Diastolic Pressure (mmHg)	13	1	
g. Mean RA Pressure (mmHg)	18	4	
h. Cardiac Output (CO) (L/min)	4.5 L/min