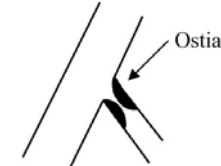


Ostial Side Branch Stenosis

Ostium Stenting / Dogbone Technique

Manfred Zehetgruber
Univ Vienna, Dept Cardiology



Be Polemic!!!!!!!!!!!!!!!

Yves L.



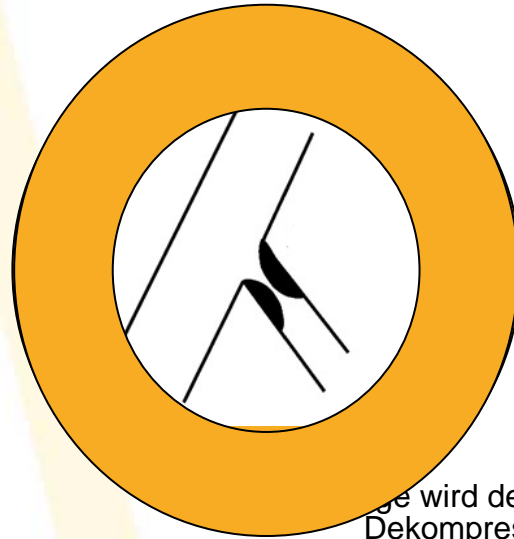
Lets be polemic!!!!

Manfred Z.

Philippe B.

Zur Anzeige wird der QuickTime™
Dekompressor „
benötigt.

Medina 0.0.1 - still undefeated ?



T-Stent

Culotte

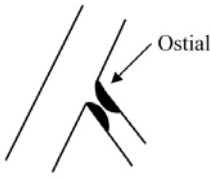
...ge wird der QuickTime™
Dekompressor „
benötigt.

Crush

POT

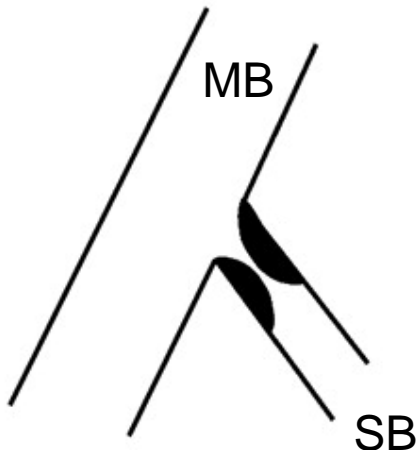
TAP

Mini - Crush



„*Primum Nihil Nocere*“

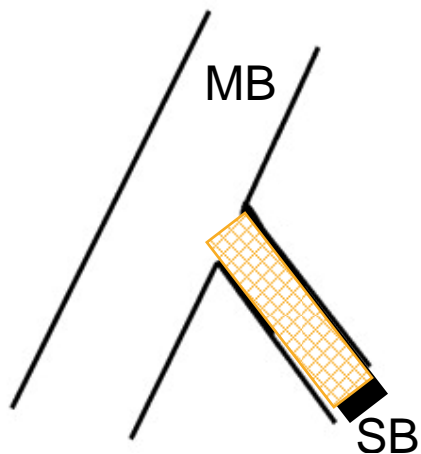
A side branch is just a side branch
is just a side branch is just a side branch
is just a side branch is just a
side branch



Zur Anzeige wird der Q
Dekompressor
benötigt.

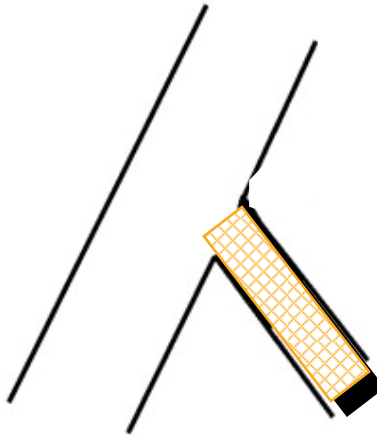
„*Primum Nihil Nocere*“

I want to
stent SB lesion, only
I don't want to
compromise MB



Zur Anzeige wird der Q
Dekompressor
benötigt.

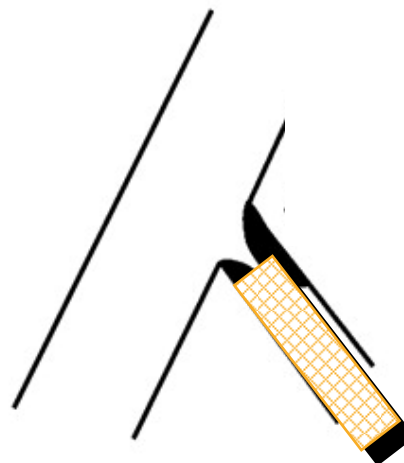
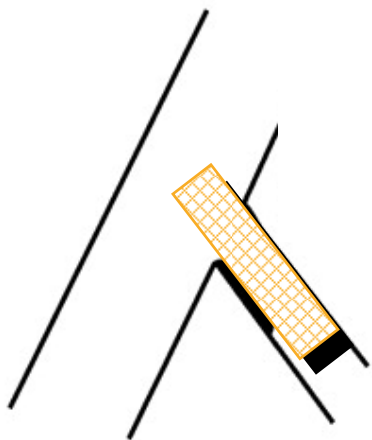
Mission Impossible?



Stent deployment not completely predictable

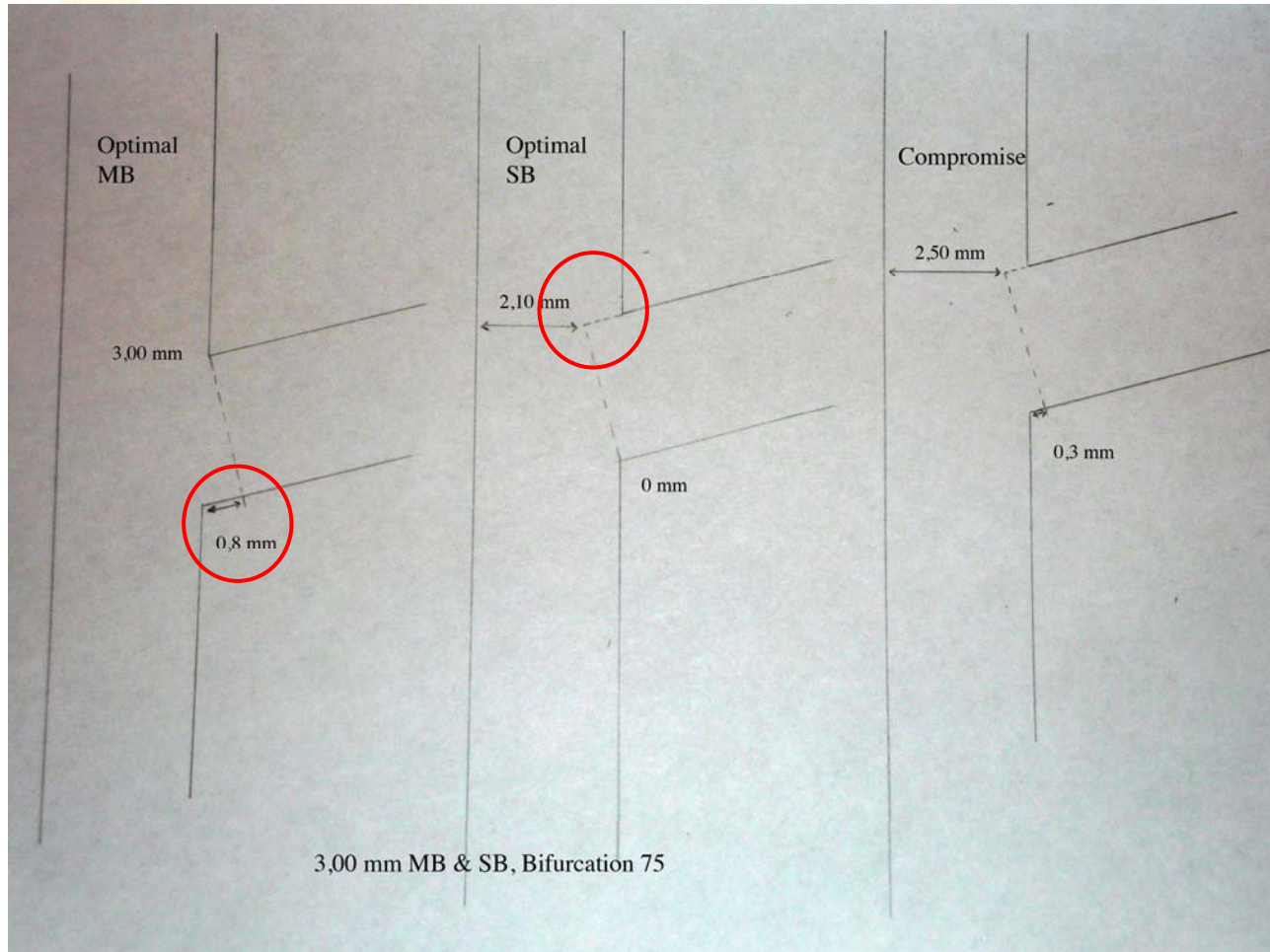
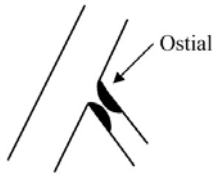
- foreshortening,
- heart (stent) motion

„Primum Nihil Nocere“

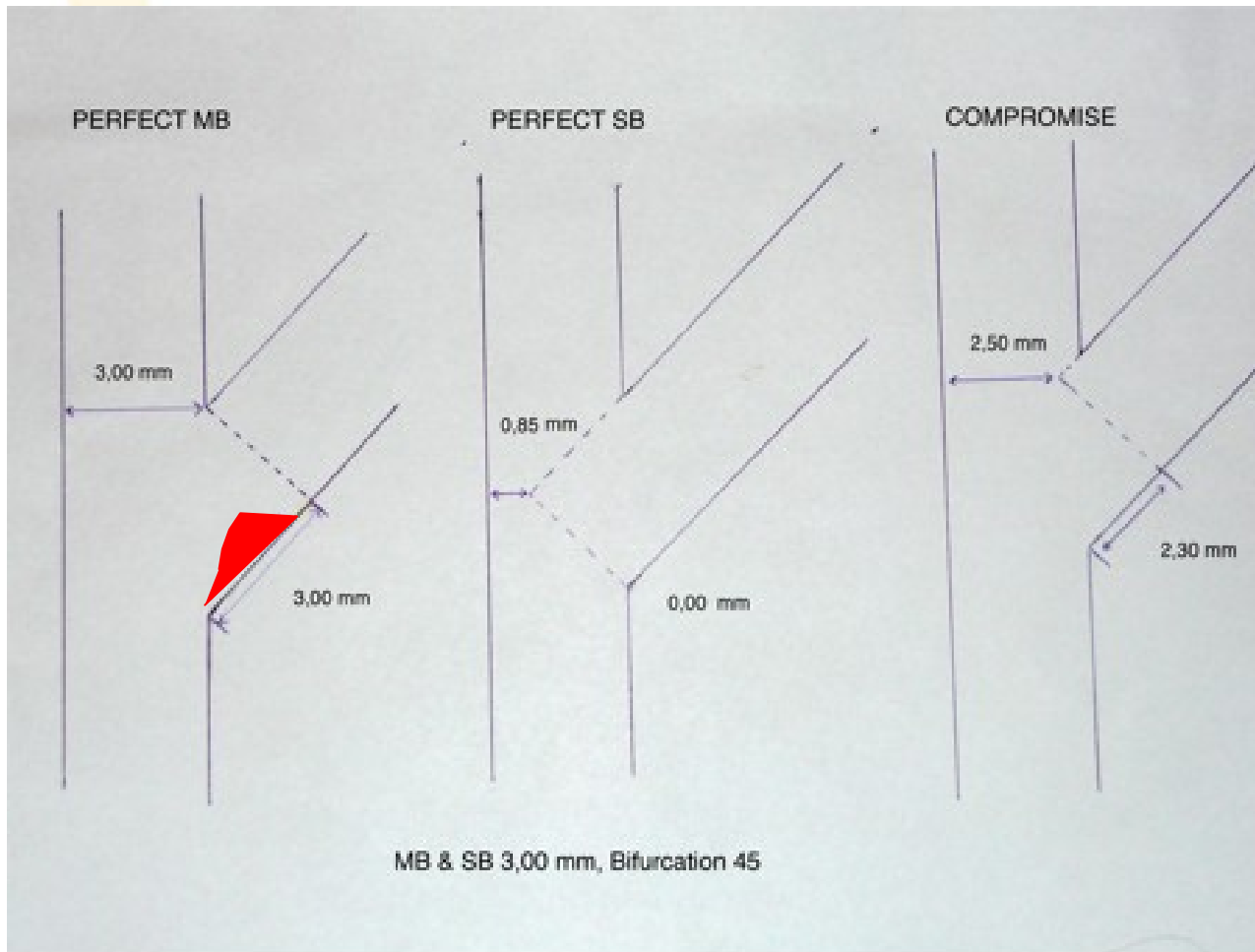


Influence of angulation

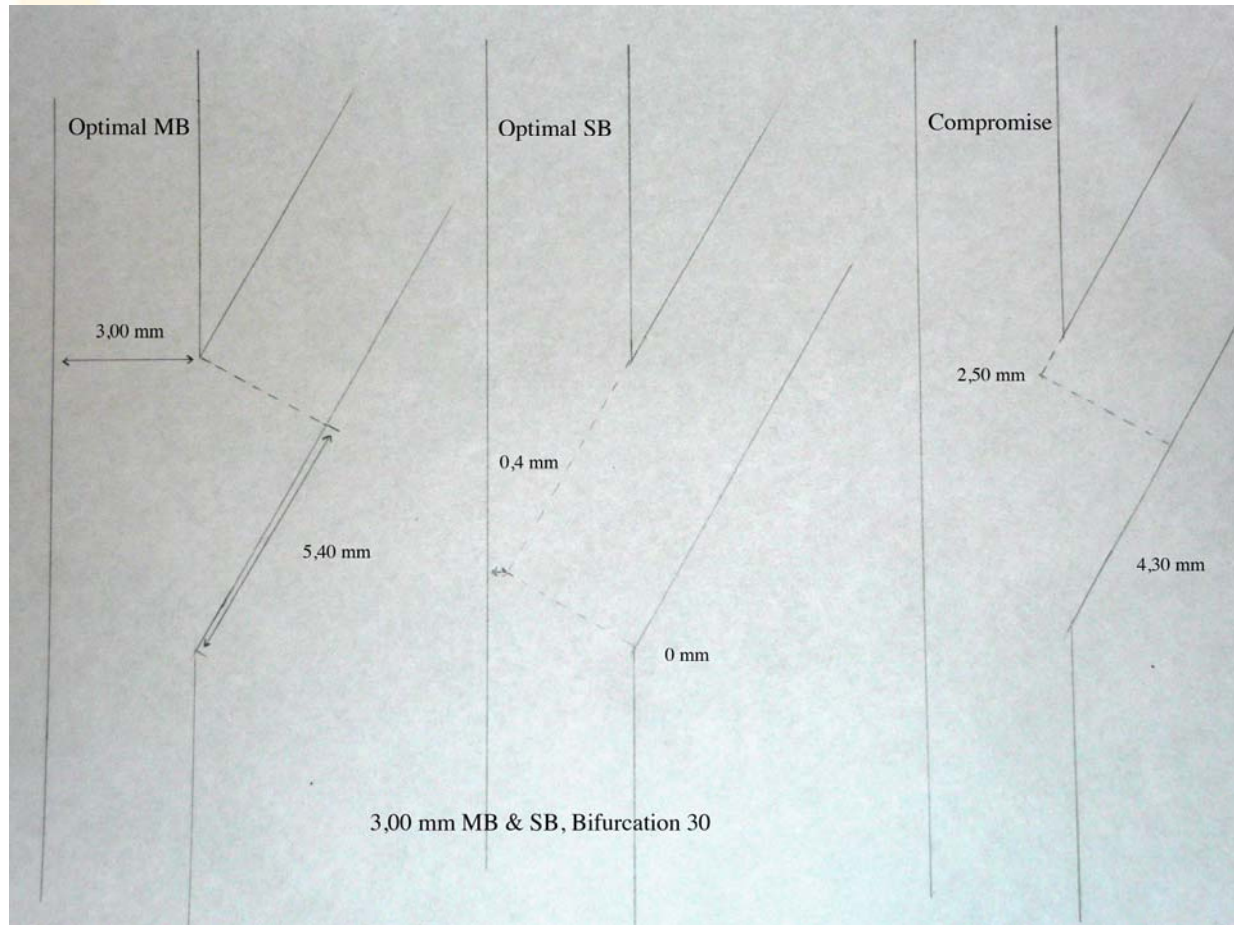
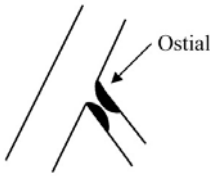
Influence of angulation - 75



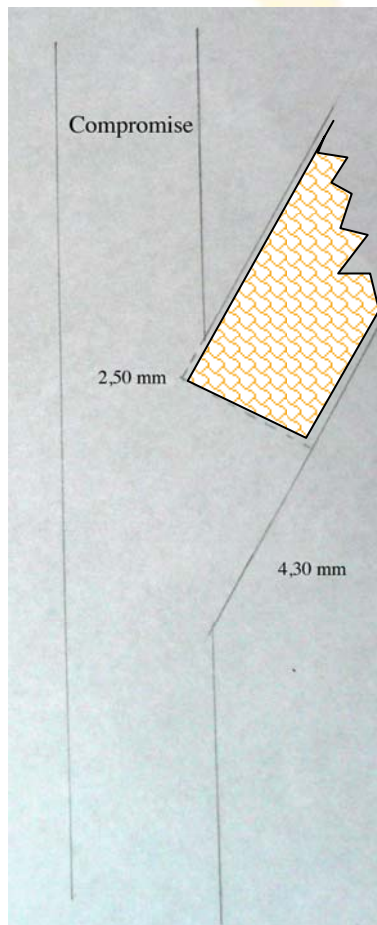
Influence of angulation - 45



Influence of angulation - 30



Angulation: Conclusion 1

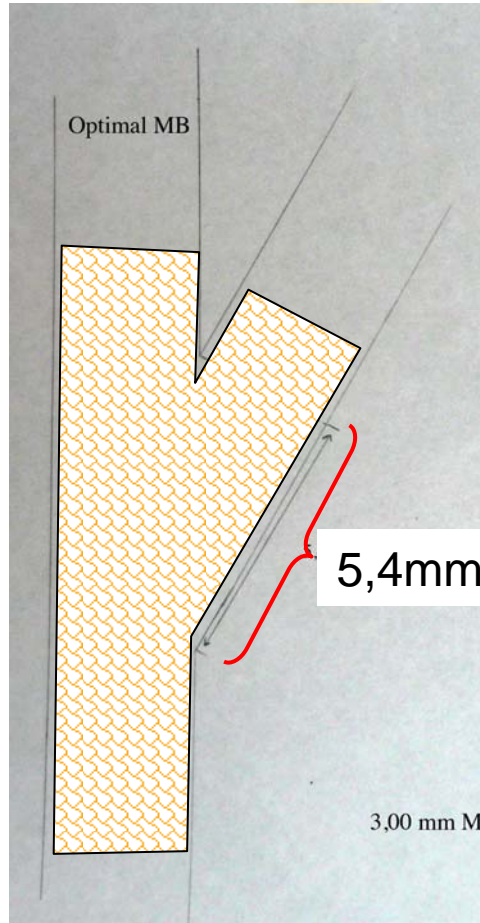


Ostial SB stenting in angles < 45 degrees



G A P

Angulation: Conclusion 2



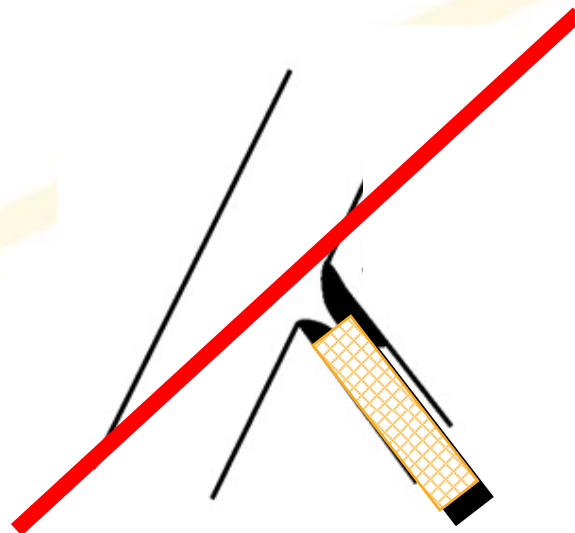
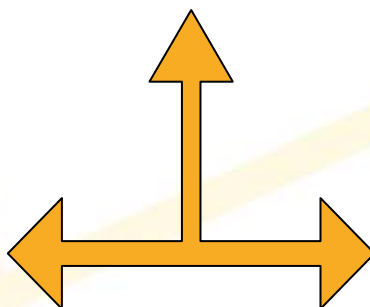
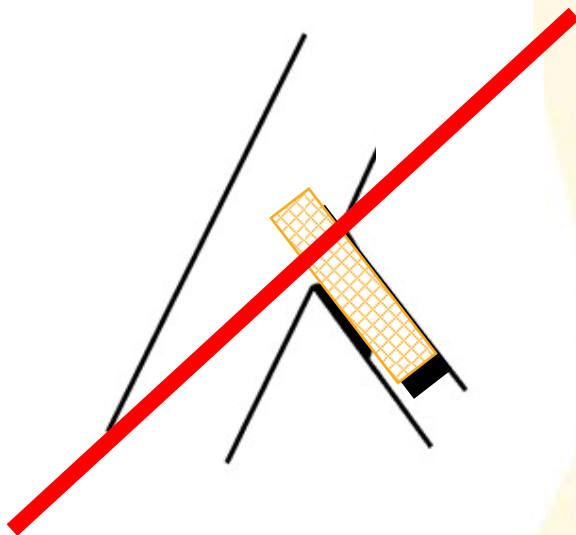
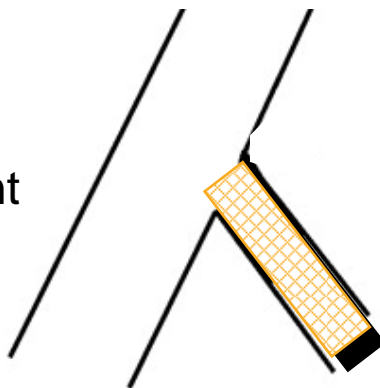
Dedicated bifurc. devices in angles < 45 degrees



should cover SB > 5 mm

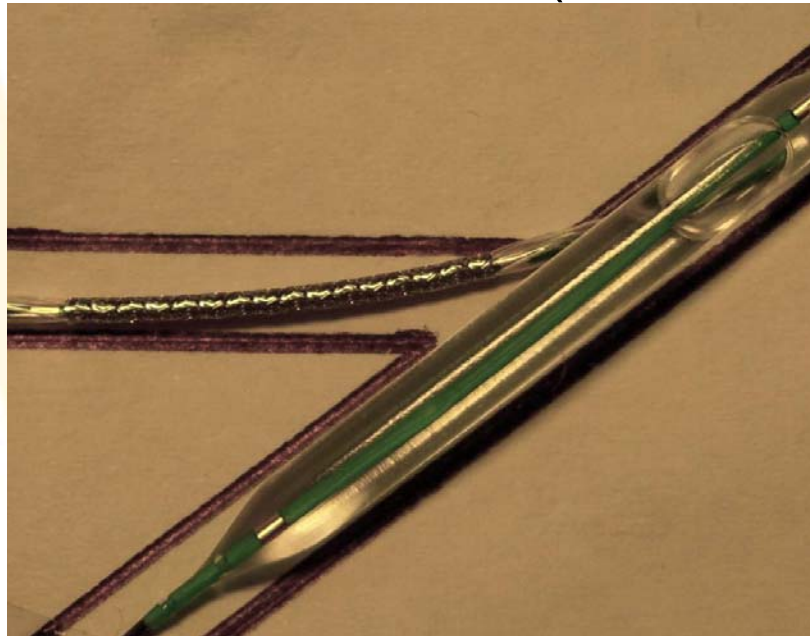
Techniques to facilitate Ostium Stenting

1. Define point of stent deployment
2. Must not compromise MB



Manoeuvres to define Stent placement

- inflated MB ballon (ballon / vessel ratio 1:1)



- endothelial damage in MB !?
 - Stent position ?

Dogbone Technique

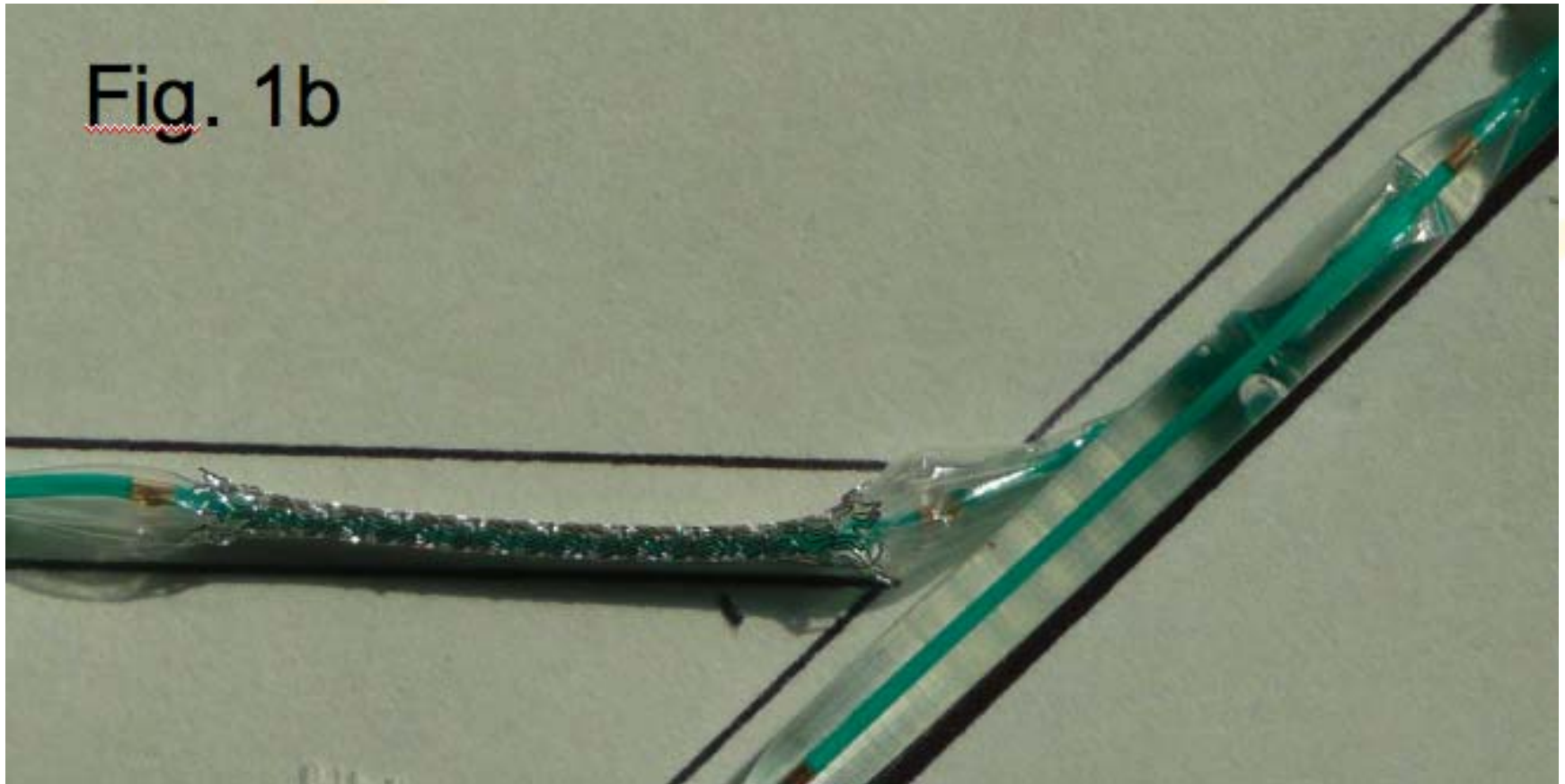


Dogbone Technique



Taxus Liberte (2.5 atm)

Dogbone Technique



Dogbone Technique

Advantages:

- 1. Stent placement more predictable***
- 2. Less endothelial damage in MB***



Method:

- bifurcational polystyrene model
- 30°, 45° and 70° in MB and SB
- MB/SB 3/3mm and 3,5/3,5mm
- different MB ballon sizes (Maverick)
- Taxus Liberte (2.5 atm)

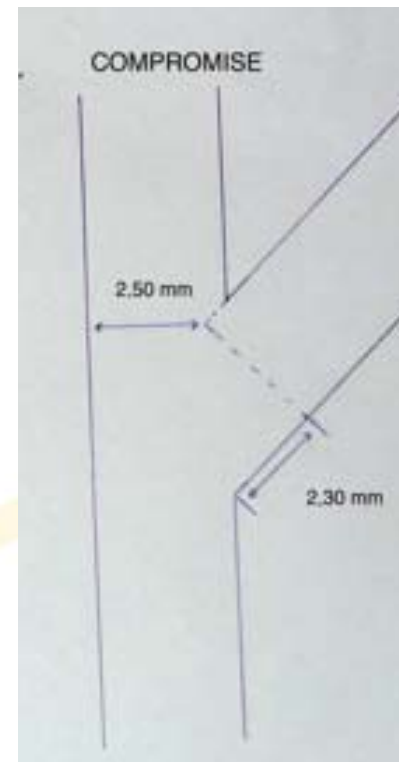
Dogbone Technique



Aim:

Define

**„perfect- compromise“
ballon size according to
vessel diameter and
angulation**



Dogbone Technique

MB&SB 3,00mm - Angle/Ballon	30°/2,25	45°/2,00	75°/2,0
MB-MLD (mm)	2,50	2,50	2,70
SB-GAP (mm)	4,40	2,30	0,45
<u>Difference: MB-Diameter to MB-Ballon</u>	0,75	1,00	1,00
MB&SB 3,50mm - Angle/Ballon	30°/2,75	45°/2,50	75°/2,50
MB-MLD (mm)	2,8	2,9	3,1
SB-GAP (mm)	4,6	3,0	0,5
<u>Difference: MB-Diameter to MB-Ballon</u>	0,75	1,00	1,00

Dogbone Technique

MB&SB 3,00mm - Angle/Ballon	30°/2,25	45°/2,00	75°/2,0
MB-MLD (mm)	2,50	2,50	2,70
SB-GAP (mm)	4,40	2,30	0,45
<u>Difference: MB-Diameter to MB-Ballon</u>	0,75	1,00	1,00
MB&SB 3,50mm - Angle/Ballon	30°/2,75	45°/2,50	75°/2,50
MB-MLD (mm)	2,8	2,9	3,1
SB-GAP (mm)	4,6	3,0	0,5
<u>Difference: MB-Diameter to MB-Ballon</u>	0,75	1,00	1,00

Dogbone Technique

European Bifurcation Club

QuickTime™ and a
None decompressor
are needed to see this picture.

EBC

QuickTime™ and a
None decompressor
are needed to see this picture.



Dogbone Technique



QuickTime™ and a
None decompressor
are needed to see this picture.

QuickTime™ and a
None decompressor
are needed to see this picture.

Conclusion

1. Dogbone technique allows predictable stent deployment in ostial side branch stenoses and T-stenting.
2. Ostial stenting in acute angles $<45^\circ$ is unlikely to give satisfying result.
3. What about POBA in 0.0.1?

Proposal

1. Registry for 0.0.1 stenoses by EBC !?
2. Multicenter trial on dogbone (in 0.0.1 and (prov) T)

manfred.zehetgruber@meduniwien.ac.at



Zur Anzeige wird der QuickTime™
Dekompressor „
benötigt.

- The End -