

# Platelet function testing predicts bleeding complications in elderly patients admitted for an acute coronary syndrome: insights from the ANTARCTIC trial



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for the **ACTION Study Group**  
[www.action-coeur.org](http://www.action-coeur.org)

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**I have the following potential conflicts of interest to report:**

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## BACKGROUND

- ✓ **Increased risk of bleedings in elderly patients particularly if ACS/PCI.**
- ✓ **Antiplatelet therapy adjustment using PFT\* failed to improve net clinical benefit in the randomized ANTARCTIC trial.**

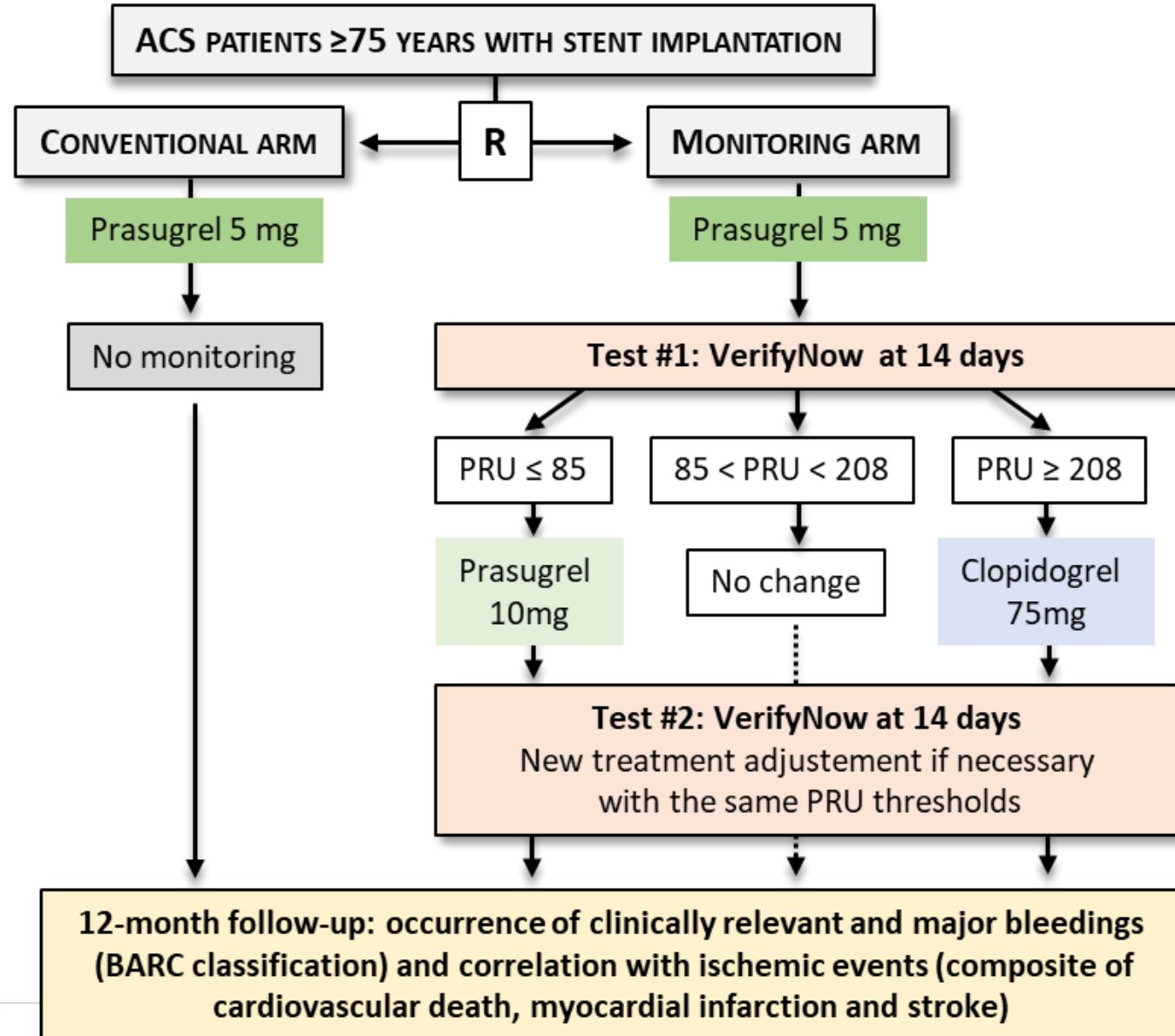
### STUDY PURPOSES

- ➔ **To determine the incidence of bleedings in a population of elderly ACS patients**
- ➔ **To determine the predictive value of PFT and treatment adjustment on the occurrence of clinically relevant bleedings.**

\*Platelet Function Testing

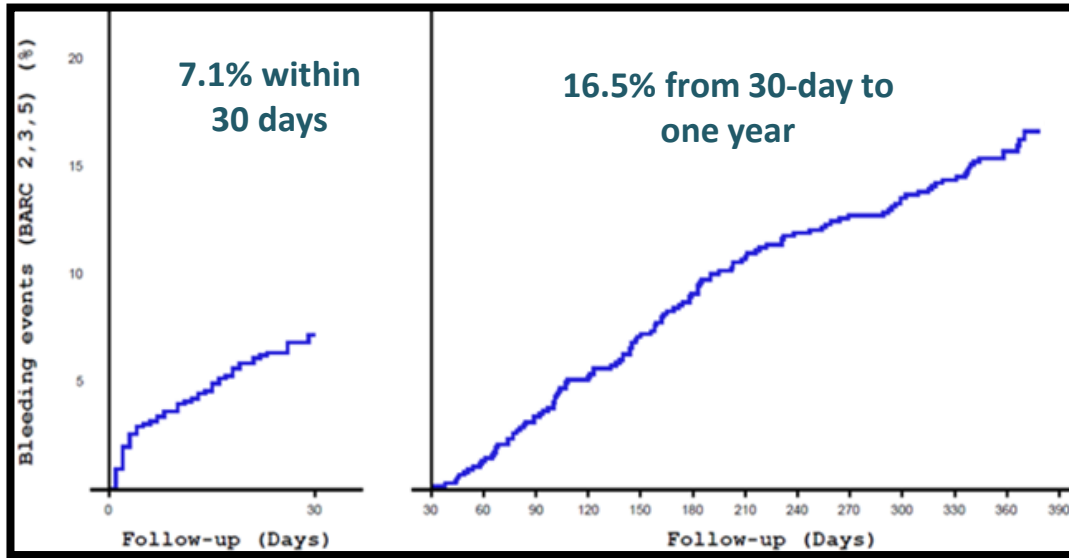
# METHODS

Prespecified analysis on the **877 patients randomized** in the ANTARCTIC trial

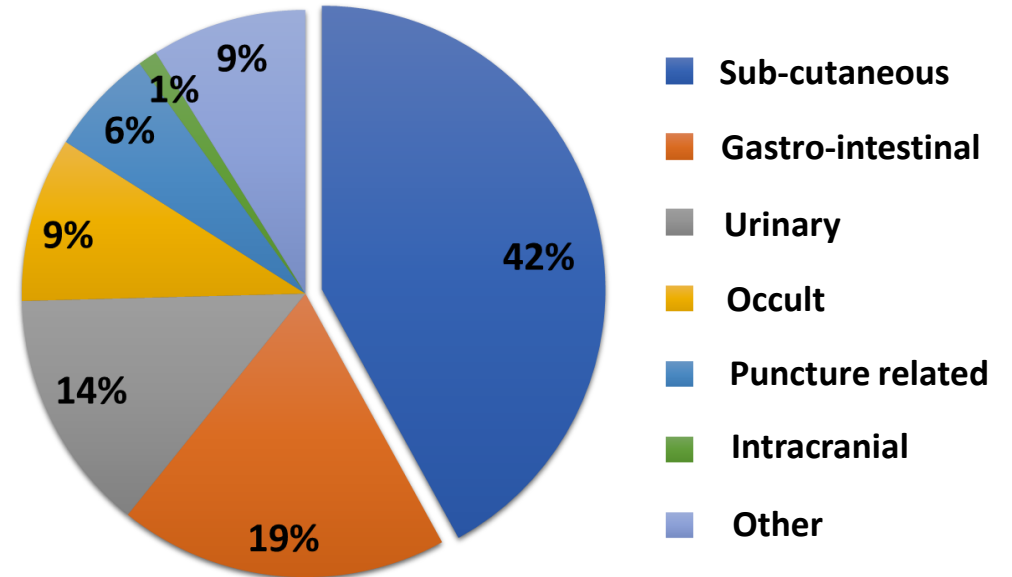


# RESULTS – BLEEDING EVENTS

## Clinically relevant bleedings (BARC types 2, 3 or 5)



At one year, clinically relevant bleedings occurred in 20.6% of this elderly population of which 1/3 occurred within the first month



Sub-cutaneous and gastro-intestinal predominant bleeding sites

## RESULTS - TREATMENTS RELATED TO BLEEDINGS

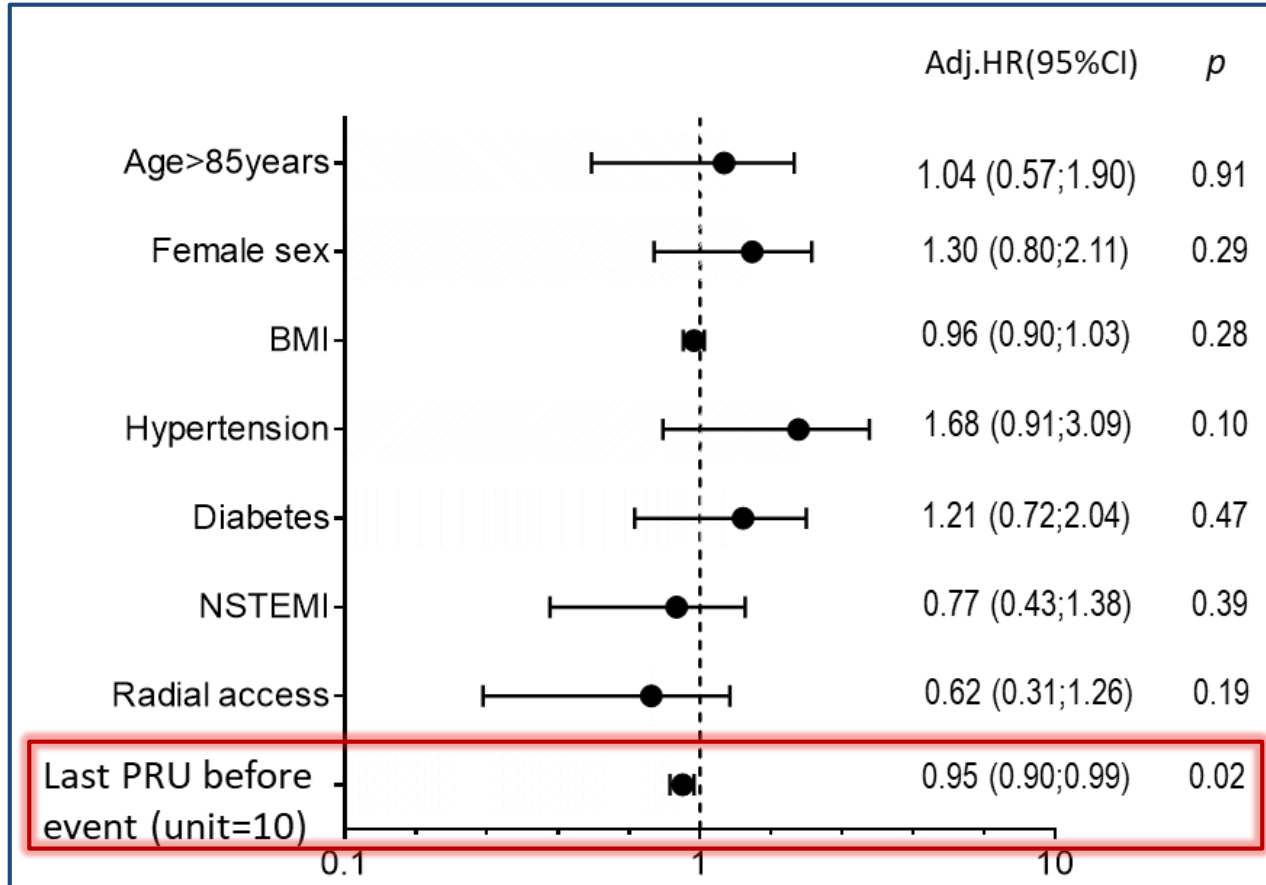
Final treatment after two-step adjustment	Overall population N=877	Clinically relevant bleeding N=181	No bleeding N=696	P value
				0.91
PRASUGREL 5MG/J	669 (77.8%)	136 (77.3%)	533 (77.9%)	
PRASUGREL 10MG/J	22 (2.6%)	5 (2.8%)	17 (2.5%)	
CLOPIDOGREL 75MG/J	169 (19.7%)	35 (19.9%)	134 (19.6%)	

**NO significant difference between the treatments administered for the occurrence of bleedings**

PRASUGREL 5MG/J	<b>20.3%</b> (136/669)
PRASUGREL 10MG/J	<b>22.7%</b> (5/22)
CLOPIDOGREL 75MG/J	<b>20.7%</b> (35/169)

**Clinically relevant bleedings in 1/5 patients whatever treatment**

# RESULTS – PREDICTIVE FACTORS OF CLINICALLY RELEVANT BLEEDINGS



## Last measured PRU

	clinically relevant bleeding (n=181)	No bleeding (n=696)
Mean ± SD	104 ± 63	120 ± 55
Min, Max	2, 308	3, 357

**Last PFT → the only independent predictor of clinically relevant bleedings**

## CONCLUSIONS

- 1 Clinically relevant bleedings were observed in 1 out of 5 elderly ACS stented patients
- 2 Following treatment adjustment according to platelet reactivity, the type of antiplatelet therapy (drug/dose) was not predictive factor of bleeding events
- 3 PFT did not improve clinical outcomes  
BUT identified patient bleeding risk when the chronic treatment was installed