DAPT – When to Use Beyond 12 Months?

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Disclosures

- **Research**: NIH, Amylin/Bristol Myers Squibb, GlaxoSmithKline, Verily Life Sciences, Metanomics, Boehringer Ingelheim, Sanofi
- **Consulting/Honoraria**: BioKier, Roche Diagnostics, DemeRx, MedScape/TheHeart.org, Philips Healthcare, NIH, Metanomics
- **Organizations**: Society of Cardiovascular Patient Care (now part of ACC), AstraZeneca HealthCare Foundation, *JACC: Basic to Translational Science*

Case Study

74 year old diabetic woman with NSTEMI a year ago s/p DES to mid LAD (3 mm vessel), minimal residual disease. She returns to clinic for routine follow-up

PMH: HTN, GERD, DM type 2, MI 7 years ago

Has tolerated aspirin 81 mg daily and ticagrelor 90 mg BID with easy bruising but no major bleeding.

What to do with the P2Y12 receptor inhibitor?

ACC/AHA FOCUSED UPDATE

2016 ACC/AHA Guideline Focused Update on Duration of Dual Antiplatelet Therapy in Patients With Coronary Artery Disease

A Report of the American College of Cardiology/American Heart Association Task Force on Clinical Practice Guidelines

An Update of the 2011 ACCF/AHA/SCAI Guideline for Percutaneous Coronary Intervention, 2011 ACCF/AHA Guideline for Coronary Artery Bypass Graft Surgery, 2012 ACC/AHA/ACP/AATS/PCNA/SCAI/STS Guideline for the Diagnosis and Management of Patients With Stable Ischemic Heart Disease, 2013 ACCF/AHA Guideline for the Management of ST-Elevation Myocardial Infarction, 2014 AHA/ACC Guideline for the Management of Patients With Non–ST-Elevation Acute Coronary Syndromes, and 2014 ACC/AHA Guideline on Perioperative Cardiovascular Evaluation and Management of Patients Undergoing Noncardiac Surgery

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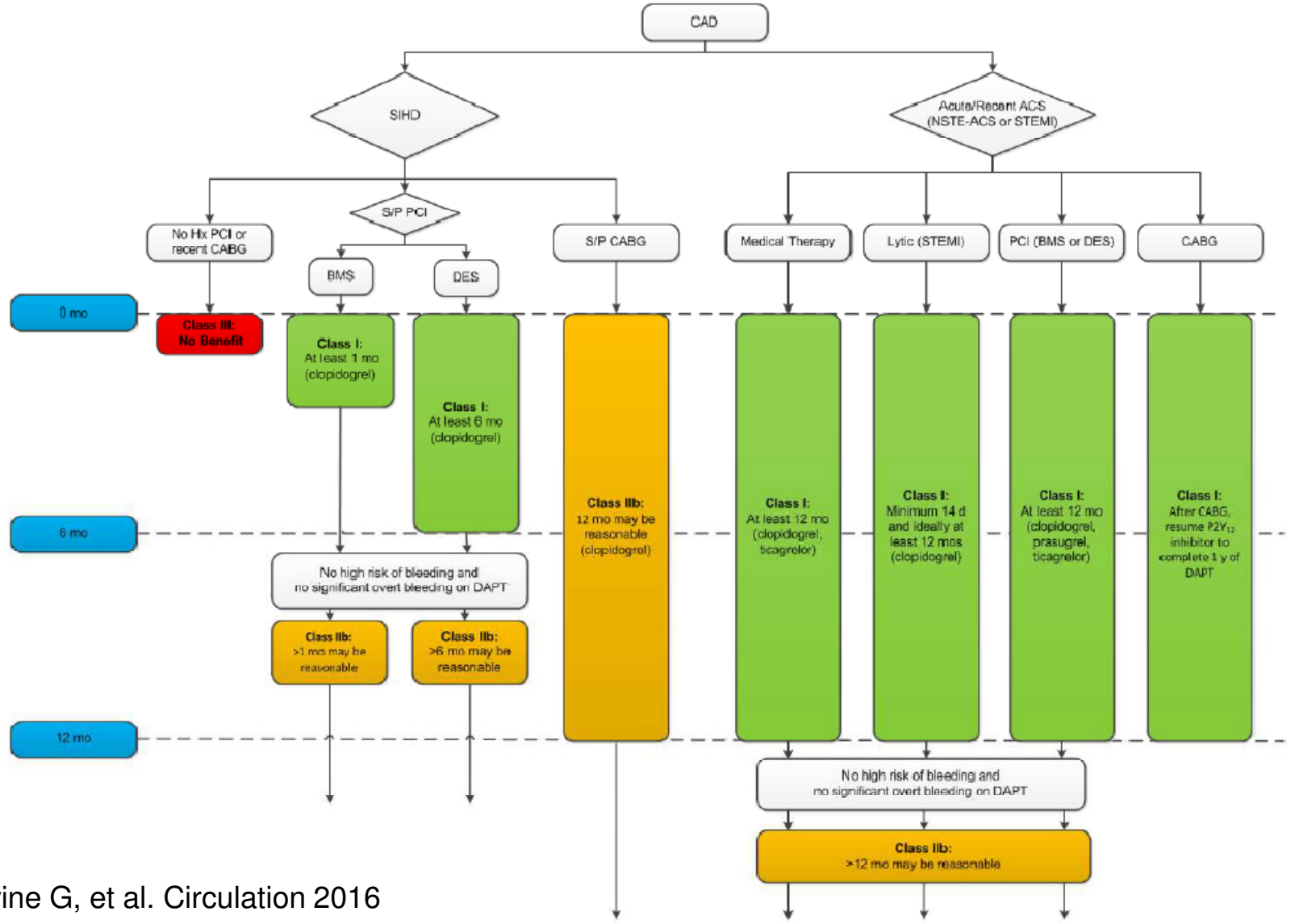
Developed in Collaboration With the American Association for Thoracic Surgery, American Society of Anesthesiologists, Society for Cardiovascular Angiography and Interventions, Society of Cardiovascular Anesthesiologists, and Society of Thoracic Surgeons.

Endorsed by Preventive Cardiovascular Nurses Association and Society for Vascular Surgery

ACC/AHA Task Force Members, see page e143

Circulation. 2016;134:e123-e155.

Duration of P2Y12 Therapy in CAD Patients Treated with DAPT



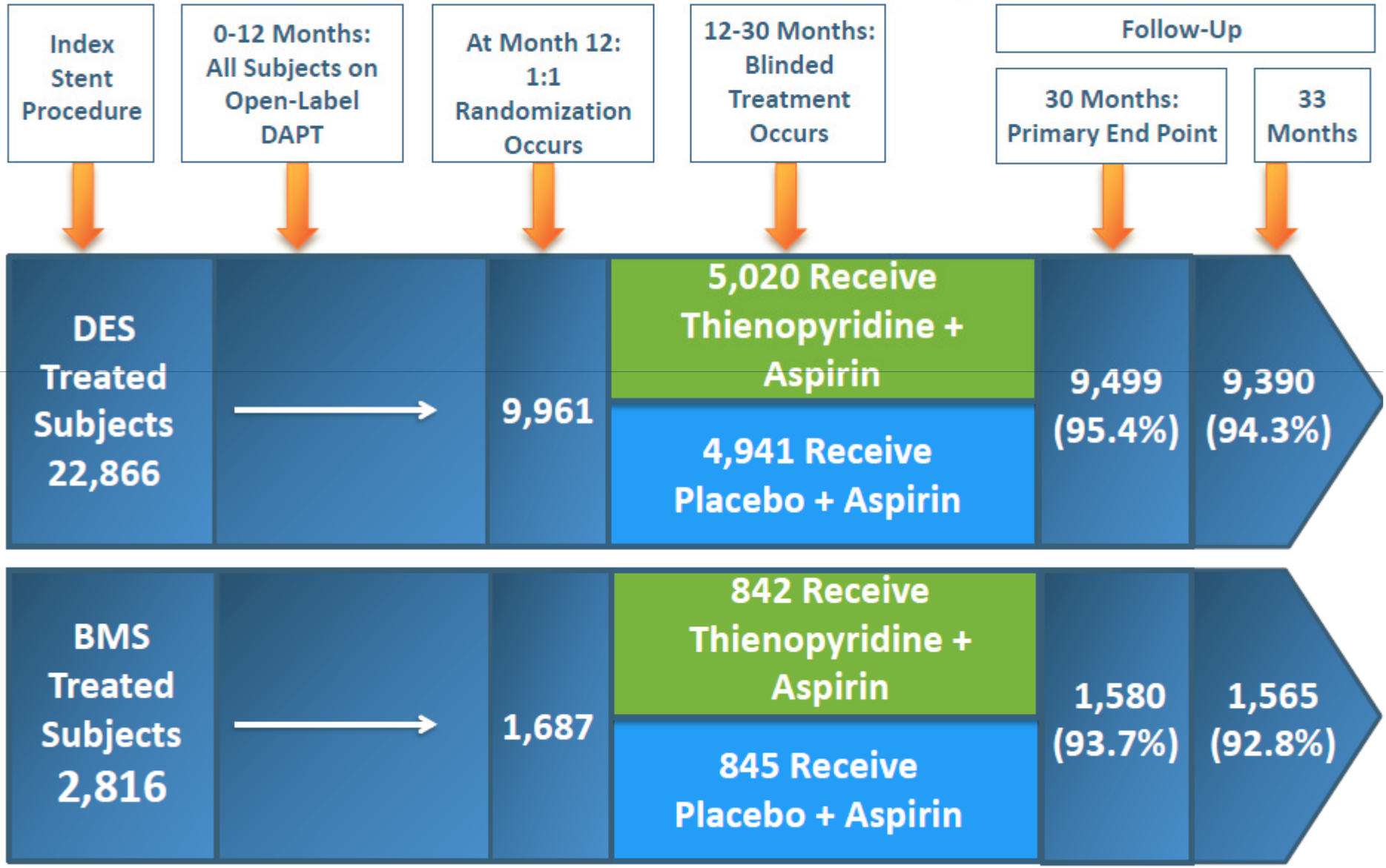
Levine G, et al. Circulation 2016

DAPT
STUDY

Dual Antiplatelet Therapy Beyond One Year After Drug-eluting Coronary Stent Procedures

Laura Mauri, Dean J. Kereiakes, Robert W. Yeh, Priscilla Driscoll-Shempp, Donald E. Cutlip, P. Gabriel Steg, Sharon-Lise T. Normand, Eugene Braunwald, Stephen D. Wiviott, David J. Cohen, David R. Holmes, Mitchell W. Krucoff, James Hermiller, Harold L. Dauerman, Daniel I. Simon, David E. Kandzari, Kirk N. Garratt, David P. Lee, Thomas K. Pow, Peter Ver Lee, Michael J. Rinaldi, and Joseph M. Massaro
on behalf of the Dual Antiplatelet Therapy (DAPT) Study Investigators

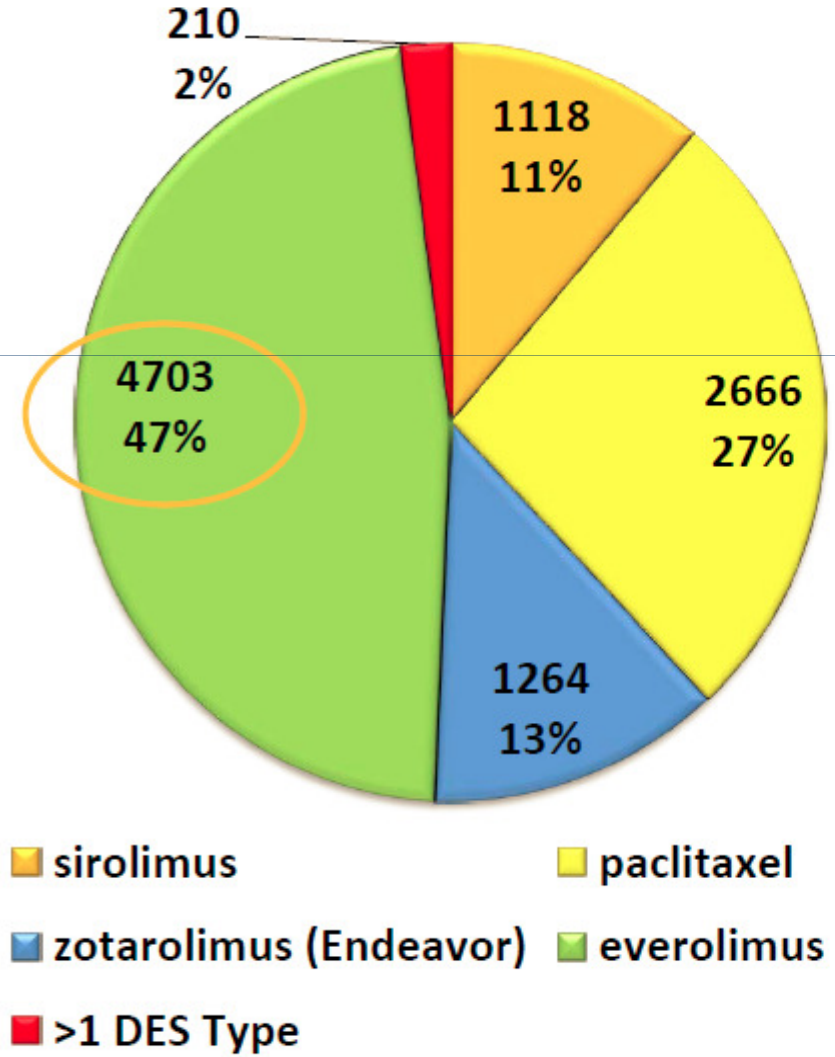
Subject Flow



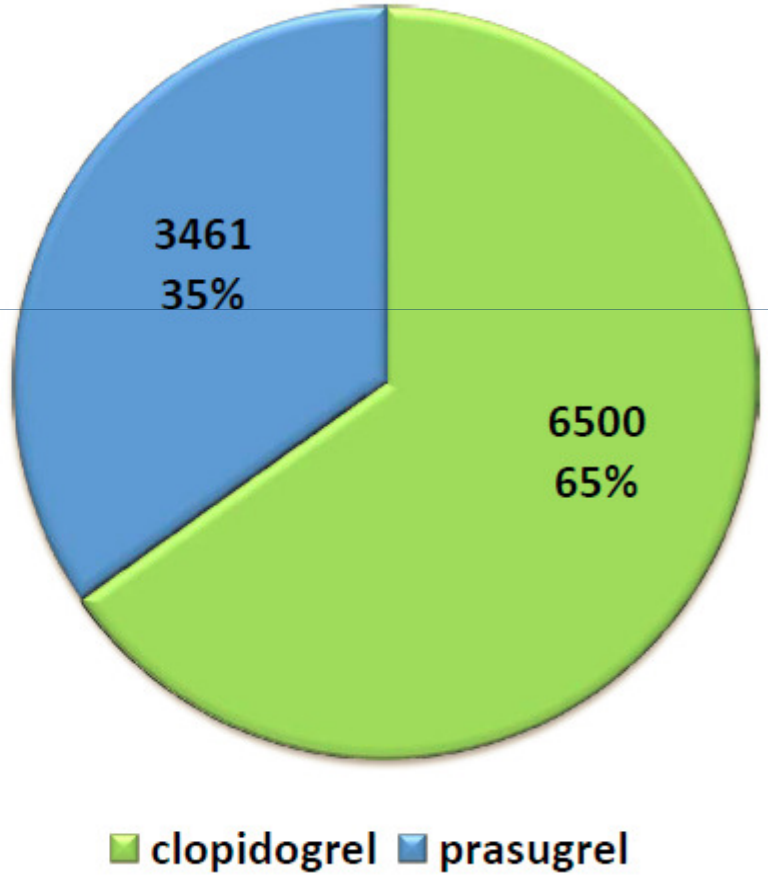
Stent & Drug Types

DAPT STUDY

Drug Eluting Stent Type



Thienopyridine Type



Co-Primary Effectiveness End Point
Stent Thrombosis

DAPT STUDY

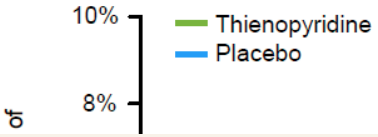
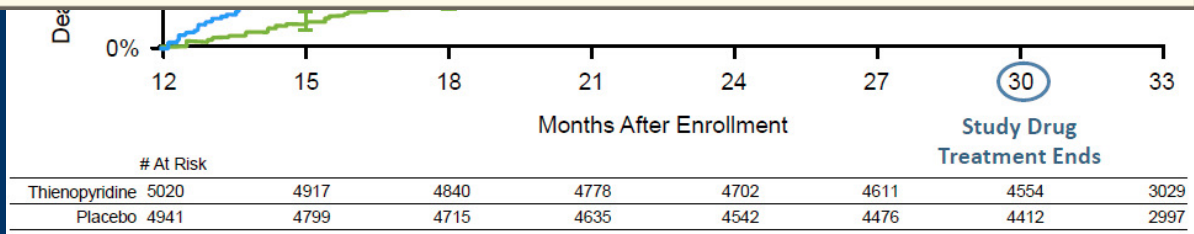


Table 3. Bleeding End Point during Month 12 to Month 30.*

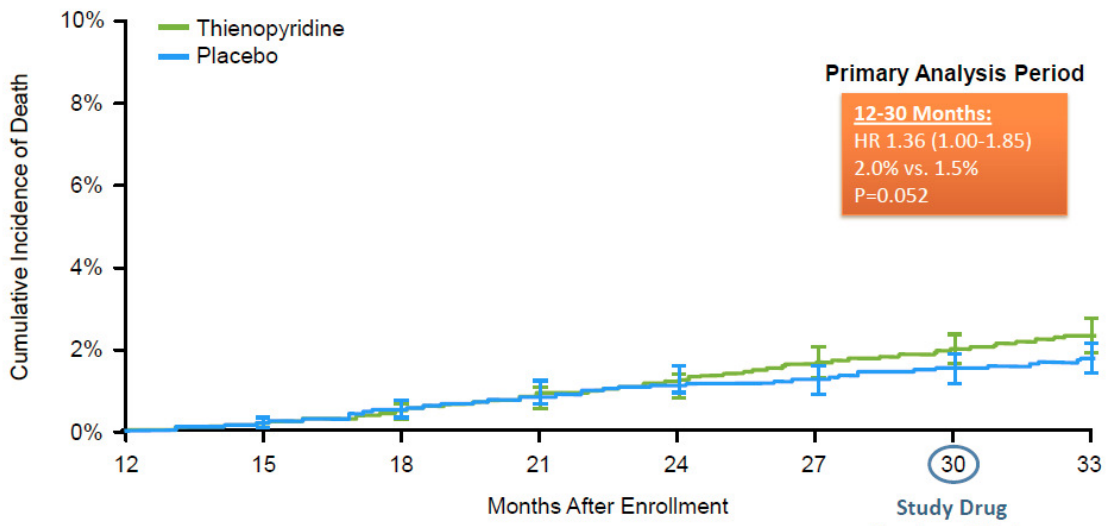
Bleeding Complications	Continued Thienopyridine (N=4710)	Placebo (N=4649)	Difference	Two-Sided P Value for Difference
	no. of patients (%)		*percentage points (95% CI)*	
GUSTO severe or moderate†	119 (2.5)	73 (1.6)	1.0 (0.4 to 1.5)	0.001
Severe	38 (0.8)	26 (0.6)	0.2 (–0.1 to 0.6)	0.15
Moderate	81 (1.7)	48 (1.0)	0.7 (0.2 to 1.2)	0.004
BARC type 2, 3, or 5	263 (5.6)	137 (2.9)	2.6 (1.8 to 3.5)	<0.001
Type 2	145 (3.1)	72 (1.5)	1.5 (0.9 to 2.1)	<0.001
Type 3	122 (2.6)	68 (1.5)	1.1 (0.6 to 1.7)	<0.001
Type 5	7 (0.1)	4 (0.1)	0.1 (–0.1 to 0.2)	0.38



Mauri L, et al. N Engl J Med 2014; 371:2155-2166

All-Cause Mortality

DAPT STUDY



# At Risk							
Thienopyridine 5020	4936	4875	4835	4777	4703	4663	3139
Placebo 4941	4866	4805	4761	4700	4659	4618	3159

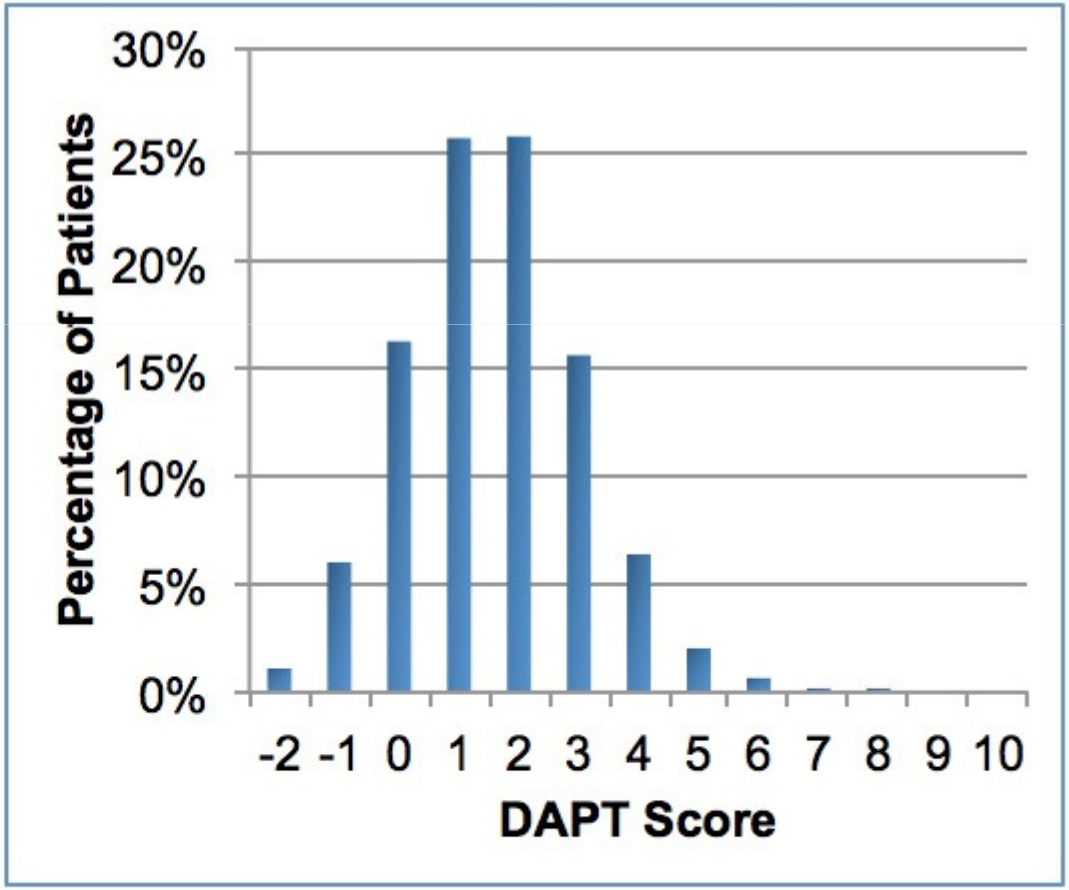
Mauri, et al. NEJM 2014

	12-30 Months			
	Thienopyridine N=5020	Placebo N=4941	P-Value	Absolute Difference
All-Cause Mortality	**98 (2.0%)**	**74 (1.5%)**	**0.052**	**24 (0.5%)**
Cardiac	45 (0.9%)	47 (1.0%)	0.98	-2 (-0.1%)
Vascular	5 (0.1%)	5 (0.1%)	0.98	0 (-)
Non-Cardiovascular	48 (1.0%)	22 (0.5%)	0.002	26 (0.5%)

The DAPT Score

Variable	Points
Patient Characteristic	
Age	
≥ 75	-2
65 - <75	-1
< 65	0
Diabetes Mellitus	1
Current Cigarette Smoker	1
Prior PCI or Prior MI	1
CHF or LVEF < 30%	2
Index Procedure Characteristic	
MI at Presentation	1
Vein Graft PCI	2
Stent Diameter < 3mm	1

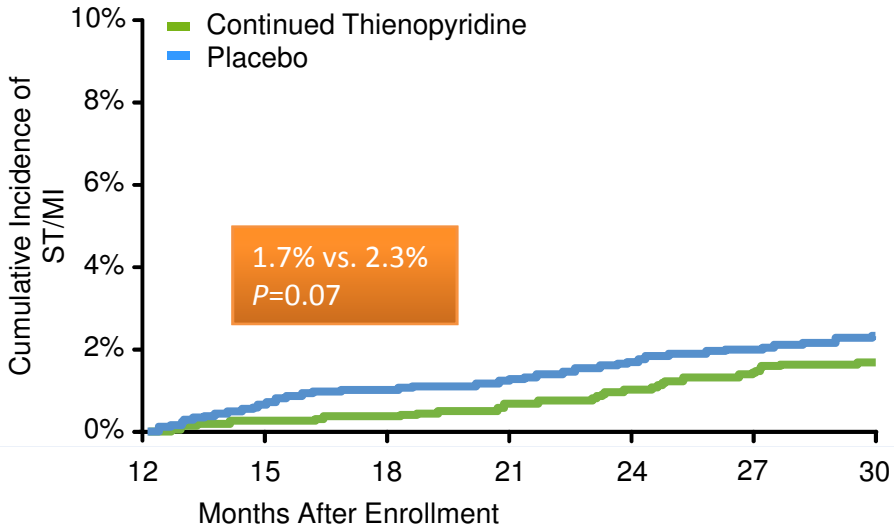
Distribution of DAPT Scores among all randomized subjects in the DAPT Study



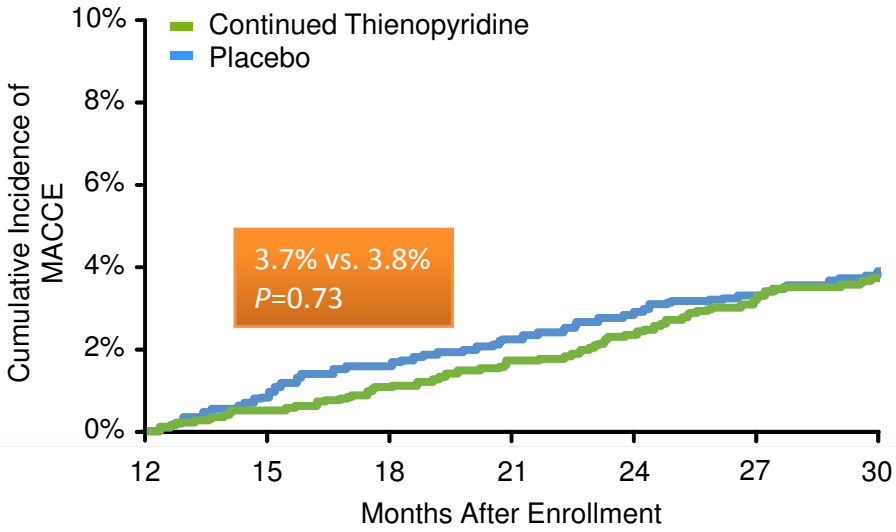
Yeh R, et al. JAMA 2016;315:1735-49.

DAPT Score <2 (Low); N=5731

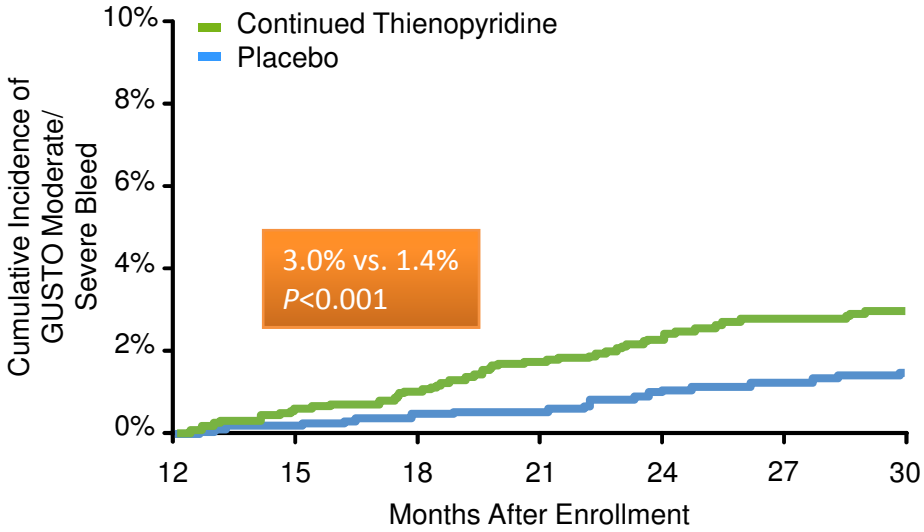
Stent Thrombosis or MI



MACCE



GUSTO Moderate/ Severe Bleeding

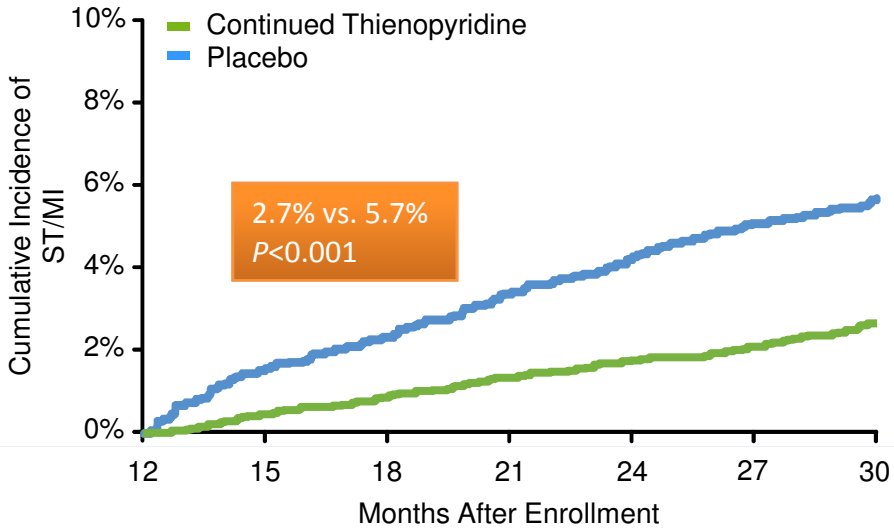


Yeh R, et al. JAMA 2016;315:1735-49.

DAPT Score ≥ 2 (High); N=5917

DAPT STUDY

Stent Thrombosis or MI



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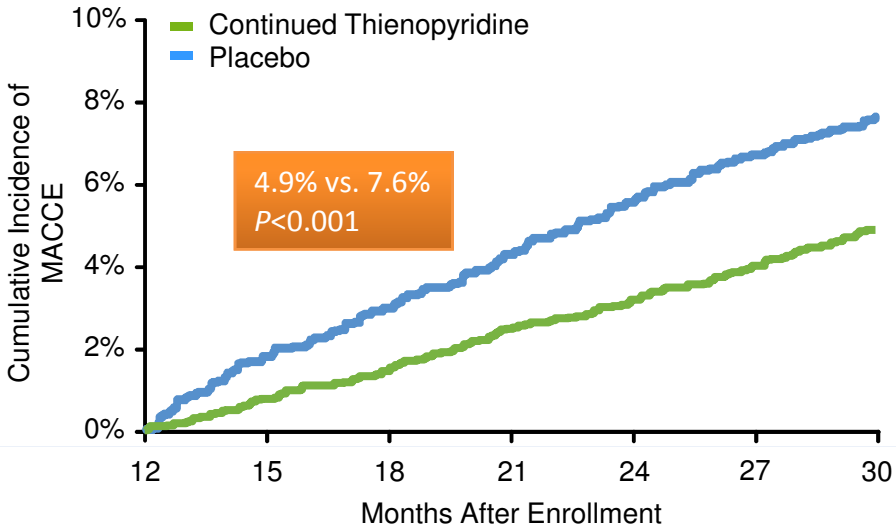

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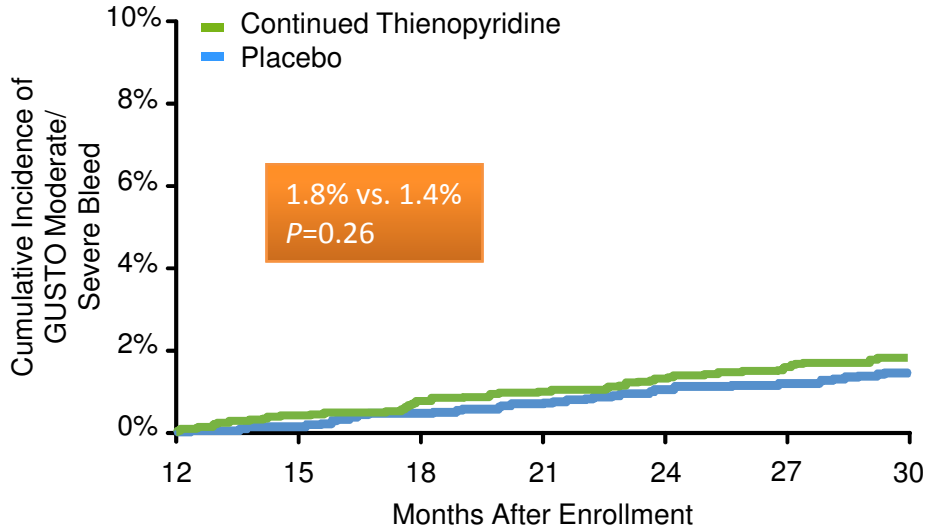

Yeh R, et al. JAMA 2016;315:1735-49.

Case Study - Conclusion

74 year old woman with NSTE
to LAD, minimal residual disea
aspirin 81 mg daily and ticagre
easy bruising but no major ble

- ***P2Y12 receptor inhibitor and aspirin continued***
- ***Lifelong aggressive secondary prevention***

Variable	Points
Patient Characteristic	
Age	
≥ 75	-2
65 - <75	-1
< 65	0
Diabetes Mellitus	1
Current Cigarette Smoker	1
Prior PCI or Prior MI	1
CHF or LVEF < 30%	2
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