

tively. The mean body-mass index was 26.1 kg/m<sup>2</sup>. In-hospital mortality was 1.84%. After 2-years follow up, the survival rate was 92.16% with an event-free survival rate of 71.9%. In our population, elevated LVFP was found in 32.3% of cases mainly in elderly (p=0.007), diabetic (p=0.041), patients with hypertension (p<0.001), with a history of myocardial infarction (p<0.001) and in Killip 3 or 4 class (p<0.001). Chronic kidney disease and anemia were also found predictive of elevated LVFP (p values of 0.007 and 0.016 respectively). An intermediate or high GRACE score and LVEF< 45% are predictive of poor prognosis. The additive prognostic value of LVFP was calculated and confirmed in our study. In fact E/e' ratio>15 improve the prognostic value of the combination of the GRACE score and LVEF with a chi<sup>2</sup> value of 54.74.

**Conclusion:** Our study confirms the additive prognostic value of LVFP in addition to the GRACE risk score and LVEF in patients admitted for ACS without ST segment elevation.

## 055

### Improved screening for silent AF during the acute phase of myocardial infarction

Karim Stamboul (1), Aurelie Gudjoncik (1), Luc Lorgis (2), Jean Claude Beer (3), Claude Touzery (1), Marianne Zeller (4), Yves Cottin (1)  
(1) CHU Dijon, Service de cardiologie, Dijon, France – (2) Service de cardiologie, CHU Dijon, Dijon, France – (3) CHU Dijon, Service de cardiologie, Dijon, France – (4) Inserm U866, Laboratoire de physiopathologie et pharmacologie cardiometaboliques, Dijon, France

**Background:** Although silent Atrial Fibrillation (AF) has been suggested to be common in Acute myocardial infarction (AMI), the true incidence and characteristics of silent AF in AMI remains unknown. We aim to assess silent AF incidence and determinants, including left atrium parameters.

**Methods and results:** 581 consecutive AMI were prospectively analyzed by Continuous ECG Scope Monitoring (CSM) for 48H after hospital admission. New onset AF was defined as at least 1 episode >30 sec, absence of p waves, and irregular RR intervals on CSM or absence of p waves or irregular RR intervals on 12-lead ECG, without any duration criterion. Left Atrial (LA) dimensions and Left Ventricular Ejection Fraction (LVEF) were determined on admission by echocardiography. We analyzed the study population into 3 groups: No AF, silent AF (defined as asymptomatic episodes of AF lasting at least >30 sec) and symptomatic AF (defined as symptomatic episodes of AF that lasted ≥12hours). Ninety-five (16.4%) patients had AF on CSM, of whom 76 (80%) developed silent AF. Compared with No AF group, patients with silent AF were older (80 vs 62 y; p<0.001), more frequently women (45 vs 27%; p=0.006), hypertensive (76% vs 52%; p<0.001) but less smoker (18% vs 38%; p<0.001). Moreover, they had significant LA enlargement based on indexed LA diameter (24.4 vs 20.3 mm/m<sup>2</sup>; p<0.001), and indexed left atrial volume (LAVI) (36.12 vs 26.95 ml/m<sup>2</sup>; p=0.002). They also had impaired LVEF (46 vs 54%; p<0.001). By multivariate analysis, age (OR (95%CI): 1.06 (1.03-1.09)), CRP (OR (95%CI): 1.01 (1.00-1.02)) and indexed LA diameter (OR (95%CI): 2.37 (1.31-4.25)) were predictors of silent AF. By ROC curve analysis, LAVI at 26.88 ml/m<sup>2</sup> was the best cutoff value to predict silent AF occurrence after AMI, with sensibility at 73% and specificity at 50%.

**Conclusion:** In this prospective study in routine clinical practice, silent AF in AMI is very common and is mostly underdiagnosed by classical discontinued serial ECG monitoring. Left atrial parameters assessed by echocardiography, including indexed diameter and LAVI, should be evaluated on admission to predict silent AF occurrence.

## 056

### Biological efficacy of a 600 mg loading dose of clopidogrel in ST-elevation myocardial infarction

Laurent Bonello (1), Marc Laine (1), Elise Camilleri (2), Sebastien Arméro (1), Julie Berbis (3), Paul Barragan (4), Franck Paganelli (1), Francoise Dignat-Geoge (5), Laurence Camoin-Jau (5)  
(1) Hôpital Nord, cardiologie, Marseille, France – (2) Hôpital de Martigues, Martigues, France – (3) Faculté de médecine de Marseille, Marseille, France – (4) Clinique les Fleurs, Ollioules, France – (5) Hôpital de la Conception, Marseille, France

**Background:** Optimal platelet reactivity (PR) inhibition is critical to prevent thrombotic events in primary percutaneous coronary intervention (PCI). We aimed to determine the relationship between high on-treatment platelet reactivity (HTPR) and ST-elevation myocardial infarction (STEMI) following a 600mg loading dose (LD) of clopidogrel.

**Methods and results:** We performed a prospective monocentre study enrolling patients on clopidogrel undergoing PCI. The VASP index was used to assess PR inhibition after clopidogrel LD. HTPR was defined according to the consensus as a VASP index ≥50%. The present study included 833 patients undergoing PCI. Most patients had PCI for an acute coronary syndrome (58.7%). The mean VASP index was 50 ±23% with a large inter-individual variability (range: 1-94%). Patients with a VASP index ≥50% were significantly older (p= 0.03), with a higher BMI (p<0.001), more often diabetic (p=0.03), taking omeprazole (p=0.03), admitted for an ACS and with a high fibrinogen level compared to good responders (VASP<50%). In multivariate analysis BMI, omeprazole use, acute coronary syndrome and high fibrinogen level (p<0.001) remained significantly associated with HTPR. Of importance, in this analysis STEMI was independently associated with HTPR when compared with the other forms of ACS (NSTEMI and unstable angina) with an odd ratio of 2.14 (95% CI: 1.3 –3.5; p=0.003).

**Conclusion:** STEMI is associated with high on-treatment platelet reactivity following 600 mg of clopidogrel. The present results suggest that 600 mg of clopidogrel may not be able to achieve an optimal PR inhibition in STEMI patients undergoing PCI and more potent drugs may be preferred.

## 057

### Short term benefit of early statins prescription in STEMI patients

Mohamed Majed Hassine, Wiem Selmi, Mejd Ben Messaoud, Ismail Ghrissi, Fehmi Karoui, Amine Hdiji, Fatma Ben Amor, Sami Ouanes, Mohamed Ben Doudouh, Mehdi Khelif, Zohra Dridi, Fethi Betbout, Habib Gama  
CHU Fattouma Bourguiba, Monastir, Cardiologie A, Monastir, Tunisie

**Objective:** Benefits of statins in the long term follow-up of ST elevation myocardial infarction (STEMI) have been established, but the short term benefits of early statins prescription remain unproven, especially according to the reperfusion result.

**Aim of the study:** to assess the benefit of early statins prescription in in-hospital outcome of STEMI patients.

**Methods:** Between January 1995 and November 2011, 1388 patients admitted for STEMI have been included in the MIRAMI (Monastir Acute Myocardial Infarction) registry. During this period, statins were introduced in early management of STEMI patients. This enabled us subdivide patients, after excluding those with missing treatment data, into 2 groups: early prescribed statins group (n= 561) versus no statins prescribed group (n=804). We compared in-hospital outcome between these two groups and among the subgroups of successful or failure reperfusion therapy.

**Results:** In the early statins prescription group, there was a significant reduction of in-hospital mortality (12.1% vs 5.3%, p<0.001), ventricular arrhythmias (5.3% vs 2.2%, p<0.001 for ventricular tachycardia, 5.6% vs 3.1%, p=0.03 for ventricular fibrillation), and atrial fibrillation (7.7% vs 5%, p=0.049). When successful reperfusion (whatever the method is), mortality was lower in the early statins prescription group (6.8% vs 1.8%, p=0.001). This difference is less pronounced when reperfusion fails (16.1% vs 11%, p=0.07).

**Conclusion:** Early statins prescription improves in-hospital outcome (mortality, ventricular and supra-ventricular arrhythmias). This improvement is much marked when reperfusion is successful with only a trend to beneficial effect in case of reperfusion failure.