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**Results** There was no difference between the two groups in clinical characteristic, while the interval time of onset to reperfusion in LVA group was longer and the incidence of Killip 3 grade was higher than those in non-LVA group (p<0.05, respectively). The peak value of plasma IL-8 in LVA was significantly higher and the peak time of plasma cTnI was much earlier than those in the non-LVA group (p<0.05, respectively). The peak values of plasma IL-8 in LVA group with LVEDP>18 mm Hg were significantly higher than that in non-LVA with LVEDP. The peak value of plasma IL-8 in LVA group with LVEDP<18 mm Hg were significant higher than that in non-LVA with LVEDP (p<0.05). At 6th month post-AMI, the value of LVEF, LVEASVI, LVEDVI, WMS and LVEDP in non-LVA group were much better than those in LVA group. The values of LVEF, LVEASVI, LVEDVI, WMS and LVEDP in non-LVA group at 6th month post-AMI were significantly improved as compared with those at the first time after PCI but the values of LVEDVI, WMS, LVEDP were improved in the LVA group. Within the 6th month follow-up, the incidences of angina post-AMI, heart failure of NYHA III grade and mortality in LVA group were significantly higher than those in the non-LVA group (p<0.05, respectively).

**Conclusions** The value of plasma IL-8 is significantly increased and correlated closely with left ventricular remodelling status and haemodynamic change in patients with LVA after AMI. It is indicated that the over activity of immune inflammatory medium IL-8 involves in the process of LVA formation and has an important clinical significance in early diagnosis and appreciation of LVA post-AMI.

**e0653 LEVEL CHANGE OF PLASMA BNP AND THE RELATIONSHIPS TO THE LEFT VENTRICULAR ANEURYSM FORMATION AND CARDIAC PERFORMANCE IN PATIENTS WITH ACUTE MYOCARDIAL INFARCTION**

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Objective To investigate the change of brain natriuretic peptide (BNP) in plasma and the relationships with the left ventricular aneurysm (LVA) and cardiac performance in acute myocardial infarction (AMI) patients using left ventriculography (LVG).

Methods A total of 64 patients with primary anterior AMI accompanied LVA diagnosed by LVG were enrolled in this study and divided into LVA group (33 patients) and non-LVA group (31 patients). Plasma BNP was measured. At the immediately after PCI and 6th month after AMI, the parameters of LVEDVI, LVEASVI, LVEF, WMS and LVEDP were measured by LVG. The main adverse cardiac events (MACE) were recorded during 24 week after PCI.

Results The peak value of plasma BNP in LVA group was higher and the arrived time of peak values of peak time of plasma BNP was earlier than those in the non-LVA group (p<0.01, respectively). In 5th day and 24th week after AMI, the values of BNP in LVA group were higher as compared to those in non-LVA group (p<0.05, respectively). The peak value of plasma BNP in LVA group, regardless of whether LVEDP>18 mm Hg or LVEDP<18 mm Hg, were higher than that in non-LVA group under the same level of LVEDP (p<0.05). At 6th month after AMI, the parameters of LVEF, LVEASVI, LVEDVI, WMS and LVEDP in non-LVA group were much better as compared to those in LVA group. The peak value of plasma BNP was significantly correlated with LVEASVI, LVEDVI, WMS, LVEDP in LVA group (p<0.01, respectively), while negatively correlated with LVEF at primary PCI (r=-0.72, p<0.01). During the 6 months follow-up, the incidence of MACE in LVA group were higher than that in the non-LVA group (p<0.05). The peak value of plasma BNP in LVA group was significantly correlated with the incidence of MACE (r=0.56, p<0.05).

**Conclusions** The value of plasma BNP in the AMI patients with LVA was higher than that with non-LVA, and significantly correlated with left ventricular remodelling status and homodynamic change. It is indicated that the over secretion of BNP is involved in the left ventricular remodelling and the process of LVA formation.

**e0654 THE EFFECT OF PREVENTIVE INTRACORONARY ADMINISTRATION OF ANISODAMINE ON MICROCIRCULATION PERFUSION IN MINISWINES WITH AMI**

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Objective Anisodamine is a M-cholinergic receptor inhibitor that plays improvement effectiveness on the microcirculatice perfusion. Our previous study had ever shown reversing effect on no-reflow phenomenon (NRP) in the miniswine models with AMI. The purpose of this study was continually to explore the effect of preventive intracoronary administration of anisodamine on myocardial microcirculation in York swines models with AMI by TIMI frame count, TIMI myocardial perfusion grade and haemodynamic parameters.

Methods 18 York swines (25~35 kg, 3~4 months old) were divided into saline group (n=9) and Anisodamine group (n=9). Immediately after 2 ml saline and 2 mg anisodamine were injected into LAD in the two groups respectively, PMBS were injected into the coronary artery by three times with 5 min interval, then incidence of NRP was recognised by TIMI frame count and TIMI myocardial perfusion grade. TnI and CK-MB were measured before PMBS injection and at 5, 60, 120, 180 min after PMBS injection. MPP and PCWP were measured by Swan-Ganz catheter. ECG was recorded before and immediately after PMBS injection and STS were calculated. The changes of FR, QRS and QT duration were also compared.

Results 16 of 18 York swines survived in the whole procedure. NRP was found in all of the eight swines in saline group while four of eight swines in anisodamine group. MPP (mean perfusion pressure) was slightly increased by 4.76% only in anisodamine group (p<0.05), while MPP were significant decreased by 25.23%, 23.63%, 19.66 % immediately, 3 min and 1 h after NRP in saline group (118.5±16.2 vs 88.6±12.3, 118.5±16.2 vs 90.5±14.3, 118.5±16.2 vs 95.2±16.3 mm Hg, p<0.05), respectively, and PCWP, values of ST and myocardial Infarct size in anisodamine group were much lower than that in saline group significantly (p<0.05).

Conclusion Preventive intracoronary administration of anisodamine could improve AMI survival rate with NFP by maintaining effective myocardial microcirculation status and raising coronary perfusion pressure as well decreasing the size of myocardial infarction.

**e0655 THE EFFECT OF INTRAVENOUS ADMINISTRATION OF TIROFIBAN ON MYOCARDIAL REFLOW AND LEFT VENTRICULAR REMODELLING DURING PCI IN PATIENTS WITH ACUTE MYOCARDIAL INFARCTION**

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Objective To investigate the efficacy and safety of platelet glycoprotein IIIb/IIa inhibition (tirofiban) during PCI in AMI patients performed primary PCI.

Methods A total of 96 patients with AMI were randomised to divide into two groups: the tirofiban group (TG, n=44,) and the control
group (CG, n=52). Tirofiban was only administrated in the tirofiban group. Before the CAG, enough clopidogrel, aspirin and heparin be used in both groups. The MACE and the haemorrhage events were collected in each group during in-hospital. The lesion and reperfusion of the IRA and myocardial were analyses by QCA and TMPG. The platelet aggregation rate were recorded All patients received UCG 1 week and 24 weeks after PCI to evaluate the heart function.

**Results** There was no significant differences in age, gender, risk factors, pre-angina, the location of the AMI, heart function, and the mean interval from onset to PCI between the two groups. A greater percentage of TIMI 1 flow of IRA was achieved in TG compared with the control group before PCI (p<0.05). The percentage of TIMI 3 flow of IRA after the guild wire first crossing was higher (p<0.05) in TG. The percentage of TIMI 3 flow in TG after PCI was higher than that in CG (p<0.05). The CTFG and slow-re-flow phenomenon was fewer (p<0.05) in TG after PCI. The percentage of TMPG beyond 2 grade was higher in TG (p<0.05). The value of LVEF 1 week after PCI in TG was higher than that in CG (p<0.01). The platelet aggregation rate in TG was lower after tirofiban administration for 0.25, 0.5, 2, 6 and 12 h. There was no significant difference in haemorrhage events between the two groups. There was a lower incidence of MACE in TG compared with that in CG during in-hospital and follow up.

**Conclusion** Intravenous administration of tirofiban can inhibit the platelet aggregation, improve the coronary flow of IRA, decrease the incidence of NRP in AMI patients performed PCI, which in turn will improve the heart function and decrease the incidence of MACE. Tirofiban can make more IRA patent before PCI, but do not increase the haemorrhage events.
e0655 The effect of intravenous administration of tirofiban on myocardial reflow and left ventricular remodelling during PCI in patients with acute myocardial infarction

Fu Xianghua, Fan Weize, Jiang Yunfa, Hao Guozhen, Wang Xuechao and Wang Yanbo

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