PROTECTIVE EFFECT OF LIPO-PGE1 ON MYOCARDIAL INJURY FOLLOWING ELECTIVE PERCUTANEOUS CORONARY INTERVENTION IN PATIENTS WITH ANGINA PECTORIS

LuochufanFirst Affiliated Hospital of Zhongshan Medical University, Guangzhou, China

Objectives This pilot study is a prospective, single-centre, randomised and open-label trial undertaken to investigate potential protective effects of lipo-PGE1 in patients undergoing elective PCI for AP.

Methods A total of 79 patients with stable or unstable AP who had been referred for elective PCI were enrolled and randomly assigned to two groups. Patients in the control group (n=39) received only the conventional medications and those in the PGE1 group (n=40) received additional 20 μg/day of lipo-PGE1 intravenously, starting at least 48 h before PCI and continuing for 5 days.

Results The incidence of post-procedural elevation of cTnT above the upper limit of normal was 25.0% in the PGE1 group and 51.3% in the control group (p=0.016), and the incidence of CK-MB elevation above the upper limit of normal was significantly lower in the PGE1 group (12.5% vs 30.8%, p=0.048). Postprocedural cTnT concentration (ng/ml) was significantly higher in the control group than in the PGE1 group at each time after PCI. Postprocedural CK-MB level (ng/ml) was also significantly higher in the control group at each time. Lipo-PGE1 was well tolerated and there were no instances of serious adverse events or side effects.

Conclusions Lipo-PGE1 treatment appears to reduce postprocedural myocardial injury following elective PCI for angina patients.