## 52<sup>nd</sup> CARDIOCON 2023: ABSTRACT

## ASSESSMENT OF LIPID PROFILE TREATMENT PRACTICES AND LIPID LEVELS IN POST-MYOCARDIAL INFARCTION PATIENTS: RESULTS FROM A TERTIARY CARE HOSPITAL OF PAKISTAN

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**Objectives:** Acute myocardial infarction (AMI) stands as a global leading cause of mortality. Following AMI, meticulous management of patients' lipid profiles for secondary prevention becomes paramount. We conducted this study to assess lipid profile practices and levels in post-AMI patients, which are crucial for secondary prevention.

**Methodology:** In this cross-sectional study, we analyzed patients who had experienced their first AMI event in the past three years. We assessed fasting and non-fasting lipid profiles, reviewed statin therapy prescriptions, and examined patient compliance. The recommended dose was defined as rosuvastatin  $\geq$ 20 mg or atorvastatin  $\geq$ 40 mg, with target total cholesterol levels set at <160 mg/dL and target LDL (low-density lipoprotein) cholesterol at <55 mg/dL.

**Results:** Among 195 patients, 71.3% were male, and the mean age was  $57.1\pm10.2$  years. The median duration since AMI was 36 [IQR: 10-48] months and 60% were diagnosed with STEMI (ST-segment elevation myocardial infarction). Only 13.8% of patients were advised to undergo lipid profile testing after AMI, 88.7% of patients were on the recommended statin therapy, and 91.8% of patients were compliant with statin therapy. Only 11.5% had LDL-cholesterol within the target range and 71.7% had total cholesterol within the target range. Hospital admission in the past 12 months was reported by 14.4%, and the re-admission rate was significantly higher among non-compliant patients (37.5% vs. 5.6%). Subsequent AMI event rate was also significantly higher among non-compliant patients (43.8% vs. 11.7%).

**Conclusion:** Our study highlights that while most post-AMI patients receive the recommended minimum statin therapy, the inadequate practice of lipid assessment may compromise therapy optimization and raise the risk of subsequent events.

Keywords: lipid profile, dyslipidemia, AMI, secondary prevention, lipid lowering therapy

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