

### Summary

Coronary heart disease is the leading cause of morbidity and mortality among women as well as men. There is a great controversy as regard the differences between men and women in the course and prognosis of acute coronary syndromes, and whether gender has an independent prognostic effect or not.

The aim of the present study is to shed a spot light on the pattern and in-hospital course of the Egyptian women with ACS and to compare these data with those of men with the same diagnosis ,

The study included 60 consecutive female and 76 consecutive male patients with a clinical diagnosis of ACS , who were admitted at CCU of Benha university.

**- All patients were subjected to the following**

- (1) Full history taking.
- (2) Through clinical examination.
- (3) Initial and serial ECGS during the hospital course.
- (4) Laboratory studies (Routine lab, serial CPK, total serum cholesterol).
- (5) Trans thoracic Ecchocardiography.
- (6) Close clinical follow up throughout the hospital course.

***We divided our patients into two groups.***

***1<sup>st</sup> group:*** patients with ST-elevation myocardial infarction (STEMI).

**2<sup>nd</sup> groups:** patients with non-ST- elevation acute coronary syndromes (NSTEMACS) including patients with unstable angina and non st-elevation myocardial infarction.

We compared the results between men and women in each group and the results between women with STEMI and those with NSTEMACS.

**Our study revealed the following:**

- Women with ACS were older, more likely to have a history of hypertension, non of them was smoker and they were less likely to have a history of prior MI or prior coronary revascularization. No gender difference was observed in the incidence of DM.
- Women presented to the hospital more late than men after the onset of symptoms and they had non significant differences in hemodynamics at presentation.
- Women were less likely to present with STEMI, but they were more likely to present with NSTEMACS especially unstable angina.
- Men and women with NSTEMACS had similar in hospital course and mortality.
- On the other hand, women with STEMI had worse in-hospital outcome than men. They were more likely to have congestive heart failure than men, but we didn't find any gender difference as regard other complications. (Which may be explained partially by the small number of our cohorts).

- The poor outcome in women with STEMI may be explained by older age, higher incidence of heart failure and lower use of cardio-protective drugs (e.g B-blockers).
- In the present study, gender wasn't an independent predictor of in-hospital mortality.
- The results were tabulated, statistically analysed, and discussed.