

**PP126 THROMBOTIC EVENT
POST COVID-19 INFECTION: A
CASE OF MYOCARDIAL
INFARCTION IN COVID-19
SURVIVOR WITH ATYPICAL
PRESENTATION**

MARDIAH BINTI ZAKARIA¹, ZATUL
RATHIAH BINTI ABDUL RAZAK¹,
MUHAMAD SUKRI BIN MUSTAFA¹,
HAFIDAHWATI BINTI HAMAD @ AHMAD¹

¹HOSPITAL SULTANAH NUR ZAHIRAH,
TERENGGANU, MALAYSIA

INTRODUCTION

COVID-19 infection caused by SARS-CoV-2 is a pandemic affecting multiorgan with wide range of clinical manifestations and various complications including thrombotic event such as myocardial infarction.

CASE DESCRIPTION

31 years old Malay lady previously no known medical illness presented to Emergency Department with atypical symptoms of pricking epigastric pain, bloatedness and nausea 7 months post category 3 COVID-19 infection. Physical examination was unremarkable however initial electrocardiogram (ECG) was suspicious of inferior myocardial infarction. Repeated ECG then showed ST elevation at lead II, III, aVF with reciprocal changes in keeping with diagnosis of acute inferior myocardial infarction. High sensitivity Troponin I at that time was not suggestive which was 7.0ng/L however bedside echocardiography revealed hypokinetic myocardial wall at right coronary artery (RCA) territory. Patient was then referred to medical team for urgent angiogram in view of high index of

suspicion of acute myocardial infarction which later revealing three vessel diseases (3VD). Primary percutaneous coronary intervention (PCI) was done to RCA. Patient was later planned for stage PCI to left anterior descending artery (LAD) and left circumflex artery (Lcx) in 1 month and was started with double antiplatelets.

DISCUSSION

In COVID-19 infection, thrombosis formation is contributed by extreme inflammation, endothelial injury, hypoxia, and disseminated intravascular coagulation which can later lead to thrombotic event such as myocardial infarction. Although study shows up to 20%–30% of patients hospitalized with COVID-19 have proof of myocardial association demonstrated by increased troponin levels, however patients with minimal symptoms can also experience thromboembolic complications after the acute phase of COVID-19 infection has passed. In this case study, we would like to highlight the risk of thrombotic event in COVID-19 survivor although the patient has no known medical illness and no cardiovascular history prior to this event, the diagnosis of acute myocardial infarction should not be missed in young lady with atypical presentation.

CONCLUSION

Although there is not much data on long term COVID-19 cardiovascular complications, it is documented that the risk of acute myocardial infarction and stroke is increased threefold in the first 2 weeks after COVID-19 infection.

KEYWORDS:

COVID-19, thrombotic event, myocardial infarction