

Heart attack

[Health & Medicine](#)



Case study Identification problems In the case study, the confirmed disease is a heart attack. The main symptoms of a heart attack include discomfort, pressure, heaviness or pain felt in the chest, arm or below the breastbone. One may also experience irregular heartbeats and extreme weakness, anxiety and shortness of breath (Armstrong, 3). Other symptoms include discomfort extending to the jaw, back and throat; sweating, nausea, dizziness and vomiting and feelings of heartburn.

Causes of the problem

The heart muscle needs a constant supply of oxygenated blood to keep it nourished. This blood is transported to the heart through the coronary artery. However, the coronary artery can become narrow and hinder the flow of blood to the heart. This is often caused by deposits of fatty matter, calcium, proteins and inflammatory cells on the coronary artery that form plaques, which often results in the coronary artery disease (Armstrong, 22). The plaque ruptures when it hardens, which forces platelets in the blood to move in and clot on the affected area. When these blood clots completely block the artery, the heart muscle becomes starved for oxygen. After a short period of time, the heart muscle cells die and result in permanent damage. This is what causes a heart attack.

Occlusion of the coronary artery means a collapse of the artery that transports oxygenated blood to the heart (Armstrong, 6). This results in a heart attack as the artery is no longer in a position to ensure that the heart muscle receives a continuous flow of oxygenated blood. The heart muscle requires a continuous nourishment of oxygenated blood in order to function. Lack of this results in the death of its muscle cells which brings about heart attack.

This disorder is also referred to as a myocardial infarction as it results in a permanent death of the heart muscle. 'Myo' means muscle, 'cardial' is the heart while 'infarction' refers to the death of a tissue due to lack of blood supply.

Recommendation of appropriate solutions

A possible remedy for this disorder is angioplasty. This refers to a surgical unblocking or repair of the coronary artery. This surgical procedure is often done to open up blocked or narrow coronary arteries and reinstate the flow of blood to the heart muscle. A coronary stent is a small, expandable tube that is used in the treatment of narrowed or blocked coronary artery (Armstrong, 76). This tube is placed in the coronary artery to keep it open so as to ensure a constant flow of blood to the heart muscle. Coronary stents are placed on the affected coronary artery during a procedure referred to as angioplasty or percutaneous coronary intervention (PCI). Coronary stents treat heart attack disorder as they ensure that the coronary artery remains open. This ensures that there is a constant and continuous flow of blood to the heart muscles through the coronary artery. Insertion of a coronary stent is considered to be minimally invasive as it does not involve any major incisions. It is done within a short period of time and the patients undergo less discomfort as compared to other heart procedures. Additionally, it only takes a short period of time for the patient to achieve full recovery.

Work cited

Armstrong, P. A comparison of pharmacologic therapy with/without timely coronary intervention vs. primary percutaneous intervention early after ST-elevation myocardial infarction: the WEST (Which Early ST-Elevation myocardial infarction Therapy). New York: Routledge, 2006

<https://assignbuster.com/heart-attack/>