

quired surgical pericardial drainage. Three patients had open heart surgery after pericardiocenteses (initial cause of pericardial effusion was iatrogenic). The frequent etiologies were: malignancy (60.19%), idiopathic (21.84%), infections (7.28%) and iatrogenic (4.37%), more rare were thyroid gland disease (1.94%), cardiac injury (0.97%), aortic dissection (0.97%), and one case (0.49%) was caused by heart failure, uremia, rheumatoid arthritis and Erdheim-Chester disease.

Among malignancies the most common were bronchial carcinoma (69.35%), followed by breast (10.48%), lymphoma (4.03%), gastrointestinal system (2.9%), 2 cases (0.97%) of ovarian, prostatic and cervical cancer, 1 case (0.49%) of leukemia, schwannoma, bladder, adrenal gland cancer and 5.65% were tumors with unknown primary origin. The most frequent bronchial carcinoma was adenocarcinoma (62.76%). A newly diagnosed malignancy with malignant cells in pericardial effusion was found in 13.11% of patients. Among the 124 patients with known malignancy, malignant cells were found in 35 (28.23%).

In the infection group there were 3 cases of tuberculosis, one case of Streptococcus pneumoniae and the rest of cases were viral infections.

During the follow-up period there were 144 (71.3%) deaths among 206 patients. There is a significant difference in survival among malignant, idiopathic and infective PE (Chi-square = 31.67128, p<0.00) (Figure 1).

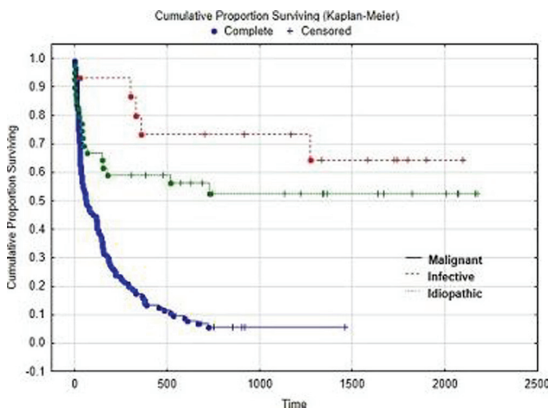


Figure 1. Kaplan-Meier survival curves.

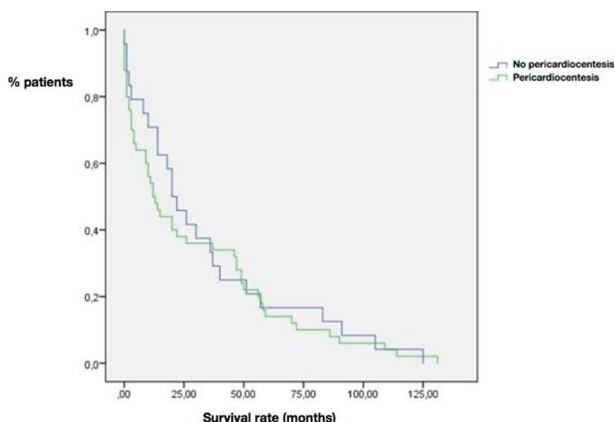
Conclusion: During follow up cardiac tamponade was associated with high mortality rate. Predominant etiology of pericardial effusion causing cardiac tamponade was malignancy. Neoplastic etiology was related with poor outcome, while infective and idiopathic pericardial effusion had better prognosis.

P697 Idiopathic severe pericardial effusion. Do we need to drain them all?

A. Cruz Utrilla¹, C. Ferrera¹, I. Nunez-Gil¹, C. Sanchez-Enrique², F. Noriega¹, A. Fernandez-Ortiz¹, T. Valverde-Higuera³, P. Martinez-Vives¹, D. Garcia-Arribas¹, A. Fernandez-Vega¹, C. Macaya¹, A. Viana-Tejedor¹.
¹Hospital Clinic San Carlos, Cardiovascular Institute, Madrid, Spain; ²MD Anderson Cancer Center Madrid, Cardiology, Madrid, Spain; ³Hospital Clinic San Carlos, Epidemiology and Public Health, Madrid, Spain

Background: Severe pericardial effusion (PE) is a critical condition, which often leads to cardiac tamponade and haemodynamic collapse. Quick diagnostic assessment is mandatory and pericardial drainage is usually required. PE of idiopathic origin is frequently related to viral pericarditis. Some of those patients could be successfully managed conservatively.

Purpose: Our aim was to evaluate evolution and prognosis of patients with severe pericardial effusion according to the therapeutic strategy.



Survival rate of idiopathic severe PE

Methods: From 2004 to 2017 all consecutive cases of severe pericardial effusion were collected in a dedicated database. Severe PE was defined according to the 2015 ESC guidelines.

Results: From 459 patients, 164 (35.7%) were classified as idiopathic after ruling out cancer origin (117, 25.5%), iatrogenic (97, 21.1%) and miscellaneous origin (tuberculosis, uremic, purulent, cardiac rupture or Dressler syndrome) (81, 17.7%). Patients were classified in two groups according to the therapeutic approach: patients who underwent pericardial drainage (N=369, 80.5%), and those who were treated medically (N=19.6, 19.5%). Mean follow up of the entire cohort was 704 days (IQR 158–2271 days) and during this time, 255 patients died (55.5%).

Among the 164 patients classified as idiopathic, 108 (65.8%) underwent drainage and 56 did not (34.2%). Of all of them, 76 died and there were no significant differences in mortality between those treated conservatively (50%) and those who underwent drainage (55.2%, p 0.55). Survival free rate of events in those who finally died was similar between groups (Log-rank test 0.24) (Picture).

Conclusion: A conservative approach, with medical treatment alone is a feasible option for patients with severe pericardial effusion of idiopathic origin.

P698 Contemporary results of 117 oncological pericardial effusion. A descriptive analysis

A. Cruz Utrilla, C.F. Ferrera, I. Nunez-Gil, F. Noriega, C.F. Sanchez-Enrique, L. Perez De Isla, A. Fernandez-Ortiz, P. Martinez-Vives, A. Viana-Tejedor. Hospital Clinic San Carlos, Cardiovascular Institute, Madrid, Spain

Introduction: Pericardial effusion (PE) is a key manifestation of some types of tumours and it supposes an advanced disease in many of them. Nevertheless, long term prognosis depending the aetiology is unknown.

Purpose: The purpose of the study is to describe types of cancer, patient profile and long-term survival of all the cases of severe PE diagnosed in a single tertiary center among thirteen years in Spain.

Methods: Cases were retrospectively collected using databases of the acute cardiac care unit and cardiac imaging of a single hospital between the years 2004 and 2017. Severe PE was defined according to the 2015 ESC guidelines focused on pericardial disease.

Results: Among the study period, 117 cases of 459 were classified as oncological. The mean age was 62.6 years (sd 13.9). There were 54 women (46.2%) and 63 men (53.8%). Mean maximum diameter was 32.7 mm (sd 0.45). The vast majority of cases were finally drained (pericardiocentesis was performed in 89.7% of cases), despite only 71% of patients presented clinical or echocardiographic signs of haemodynamic compromise. Citology was positive in 43 of 117 patients (36.8%). After a median follow up of 166 days (interquartile range 37.5–354.7), mortality was 92% (sd 0.27).

Interestingly enough, the most prevalent cancer was lung cancer (51.3%), followed by breast cancer in 17.1%, digestive in 9.4% (pancreas, colorectal, esophageal and gastric), haematological in 7.7% and others in 14.5% (Figure). Mortality was 96.7% in the lung cancer group, 85% in the breast cancer group, 90.9% in the digestive cancer group, 66.7% in haematological cases and 100% in the rest of tumours.

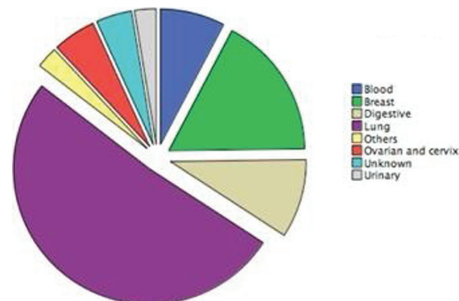


Figure 1

Conclusions: Contemporary results show that lung cancer is the most prevalent cause of oncological severe pericardial effusion and its mortality raises almost 100%. On the other hand, breast and blood cancer, also prevalent, demonstrate less mortality rates in the long term period.

P699 Facing malignant pericardial effusion. What to do first: pericardiocentesis or percutaneous balloon pericardiectomy?

V. Rial Baston, S. Jimenez Valero, P. Meras Colunga, J. Irazusta Cordoba, G. Galeote Garcia, R. Moreno Gomez, A. Sanchez Recalde, S. Rosillo Rodriguez, A. Iniesta Manjavacas, L. Martinez, L. Rodriguez Sotelo, J.L. Lopez Sendon. University Hospital La Paz, Cardiology, Madrid, Spain

Background and objectives: Malignant pericardial effusion (MPE) usually appears in the context of advanced oncological disease and it may lead to cardiac tamponade. Prevention of recurrences remains an important challenge as ma-