ORIGINAL ARTICLE

Thromboembolic Complications in Patients with Digestive Malignancies

Vlad-Alexandru IONESCU^{1,2}, Anca-Elena BARBU², Gina GHEORGHE^{1,2}, Vlad BUICA², Crista-Loredana TIUCA^{1,2}, Camelia Cristina DIACONU^{1,2,3}

¹Department of Internal Medicine, Clinical Emergency Hospital of Bucharest, Bucharest, Romania ² "Carol Davila" University of Medicine and Pharmacy, Bucharest, Romania ³Academy of Romanian Scientists

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Correspondence: Anca-Elena Barbu, "Carol Davila" University of Medicine and Pharmacy, Bucharest, Romania; e-mail: ancaa.elena99@gmail.com

Abstract. Introduction. Venous thromboembolism is the second leading cause of mortality in cancer patients. Patients with malignant conditions have a ninefold increased risk of thrombotic complications, and approximately 20% of patients with venous thromboembolism also associate cancer. The aim of our study was to determine the incidence and predictive factors for thromboembolic complications in patients with digestive cancers. Materials and methods: We conducted a retrospective study over six years, including 200 patients hospitalized in the Clinical Emergency Hospital of Bucharest, Romania, with digestive malignancies and thromboembolic complications. Results: The prevalence of venous thromboembolism among patients with malignant digestive tumors was 9.2%. The average age of these patients was 66 years. The malignancies with the highest incidence of thrombotic complications were pancreatic cancer, colorectal cancer, hepatocellular carcinoma, and gastric cancer. Histologically, all cancers were identified as adenocarcinoma, with 70% of patients exhibiting poorly differentiated tumors, and advanced tumor stages were observed in all cases. The most prevalent thrombotic complication was portal vein thrombosis, followed by deep vein thrombosis and pulmonary thromboembolism. The in-hospital mortality rate of these patients was 23.5%, while the 5-year mortality rate was 82.5%. Conclusions: We propose, as a future research direction, the enhancement of approaches to evaluate the risk of venous thromboembolism and discovery of novel biomarkers with a predictive role in patients with malignant tumors.

Keywords: venous thromboembolism; digestive cancers; prevalence; risk factors; mortality rate; prognosis.

1. INTRODUCTION

Armand Trousseau first described the association between cancer and thrombosis in 1865 [1,2]. He identified thrombophlebitis in patients with malignant neoplasms, suggesting that the occurrence of thrombotic complications is due to changes in hemostasis [1,2]. Trousseau syndrome is named after the French physician, who occurrence ironically noted the of thrombophlebitis before his death from gastric cancer [1,2]. The correlation of cancer with thrombotic phenomena was also

reported by Jean Baptiste Bouillaud in 1823 [1,2]. The procoagulant status of malignant neoplasms is still being investigated today [1,2].

Sudden death following a first episode of thromboembolism, asymptomatic cases that remain undiagnosed, or accidental discovery are factors that make it difficult to pinpoint the exact epidemiology of thromboembolism. However, it is well known that pulmonary embolism is the third most common cardiovascular disease and cause of cardiovascular death, being