

The prevalence and clinical determinants of arteriovenous fistula thrombosis in hemodialysis patients: a multicenter case–control study

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INTRODUCTION

Arteriovenous fistula (AVF) thrombosis is the leading cause of fistula failure and represents a major source of morbidity and reduced quality of life in patients undergoing hemodialysis. Despite advances in vascular access surveillance and interventional techniques, AVF thrombosis remains a frequent and clinically significant complication

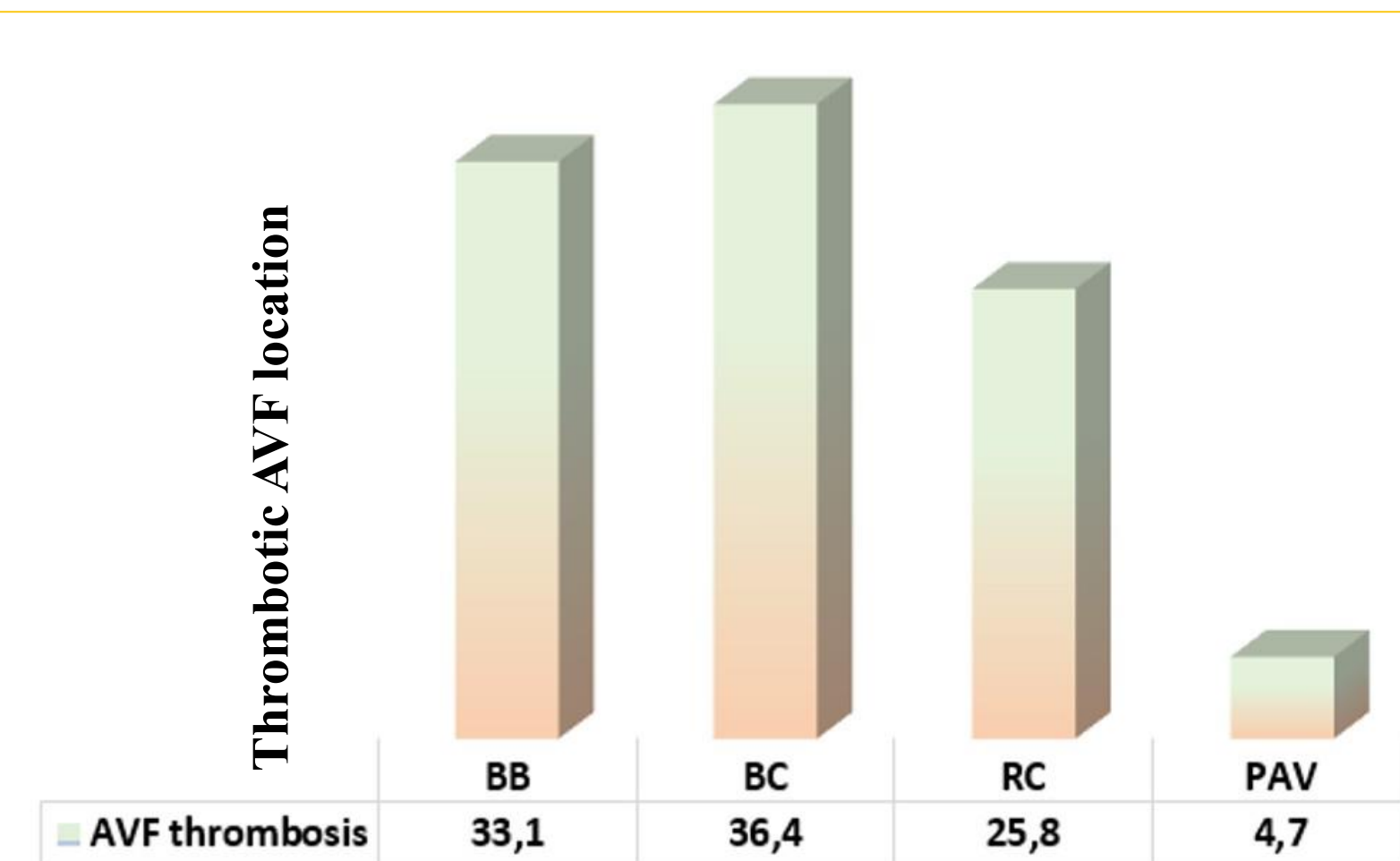
AIM

The aim of the current study is to identify clinical and access-related determinants of arteriovenous fistula thrombosis and to explore their potential role in risk stratification among hemodialysis patients

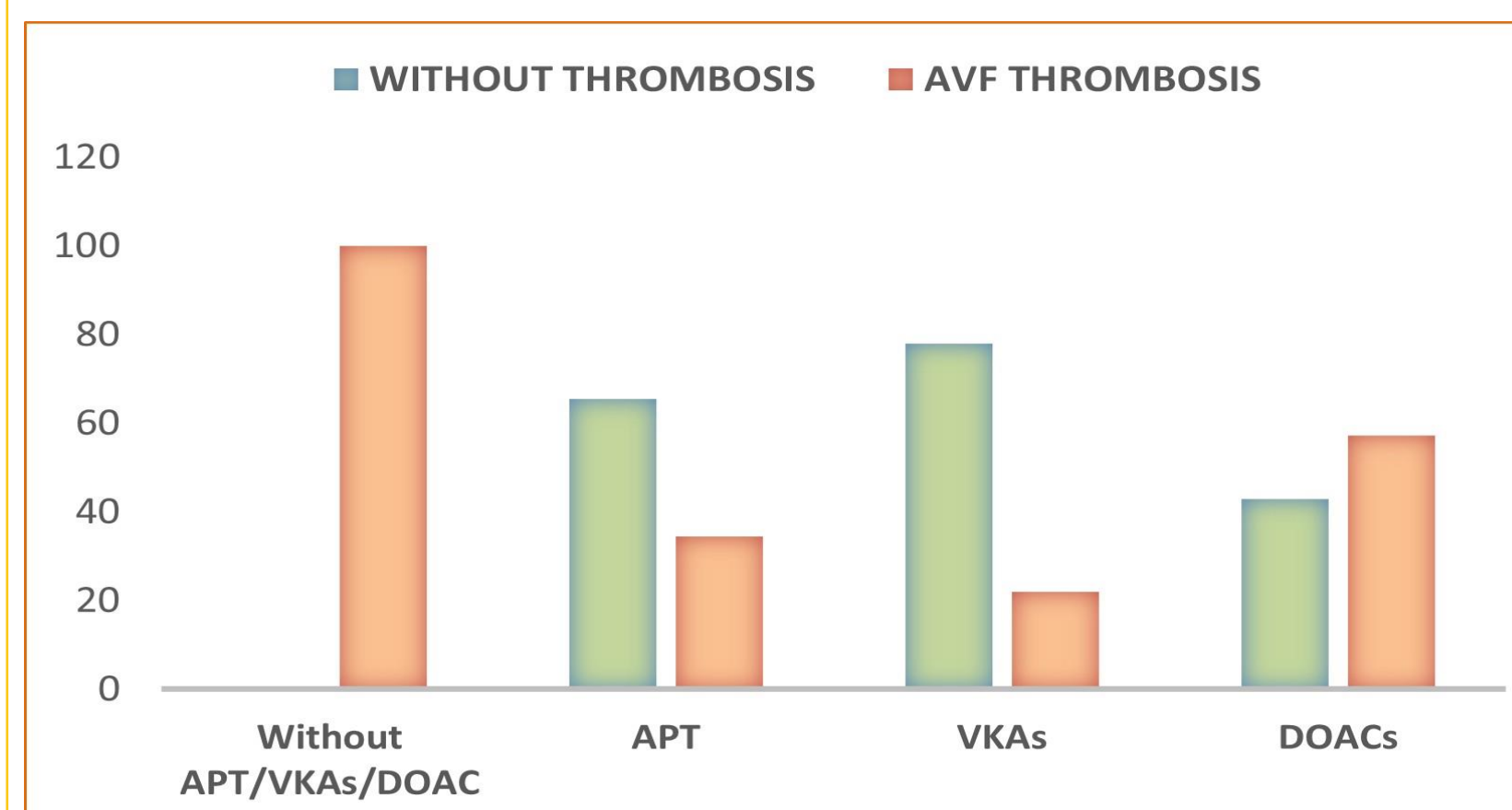
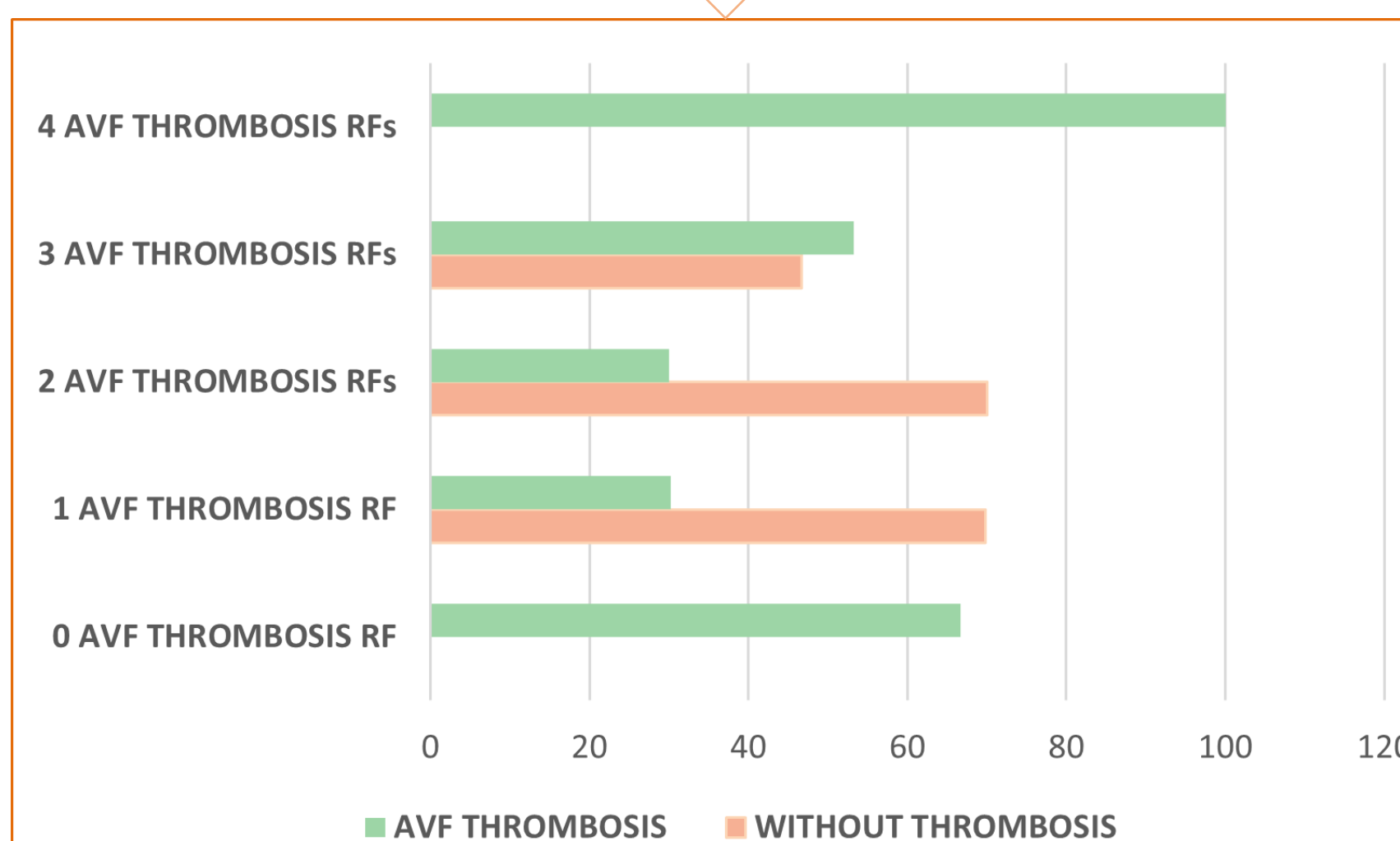
METHODS

We conducted a one-year multicenter case–control study including a total of 360 hemodialysis patients with arteriovenous fistulas treated in Diaverum Romania hemodialysis centers. Among these, 151 patients experienced arteriovenous fistula thrombosis, while 209 age- and sex-matched patients served as controls and did not develop thrombosis during the study period

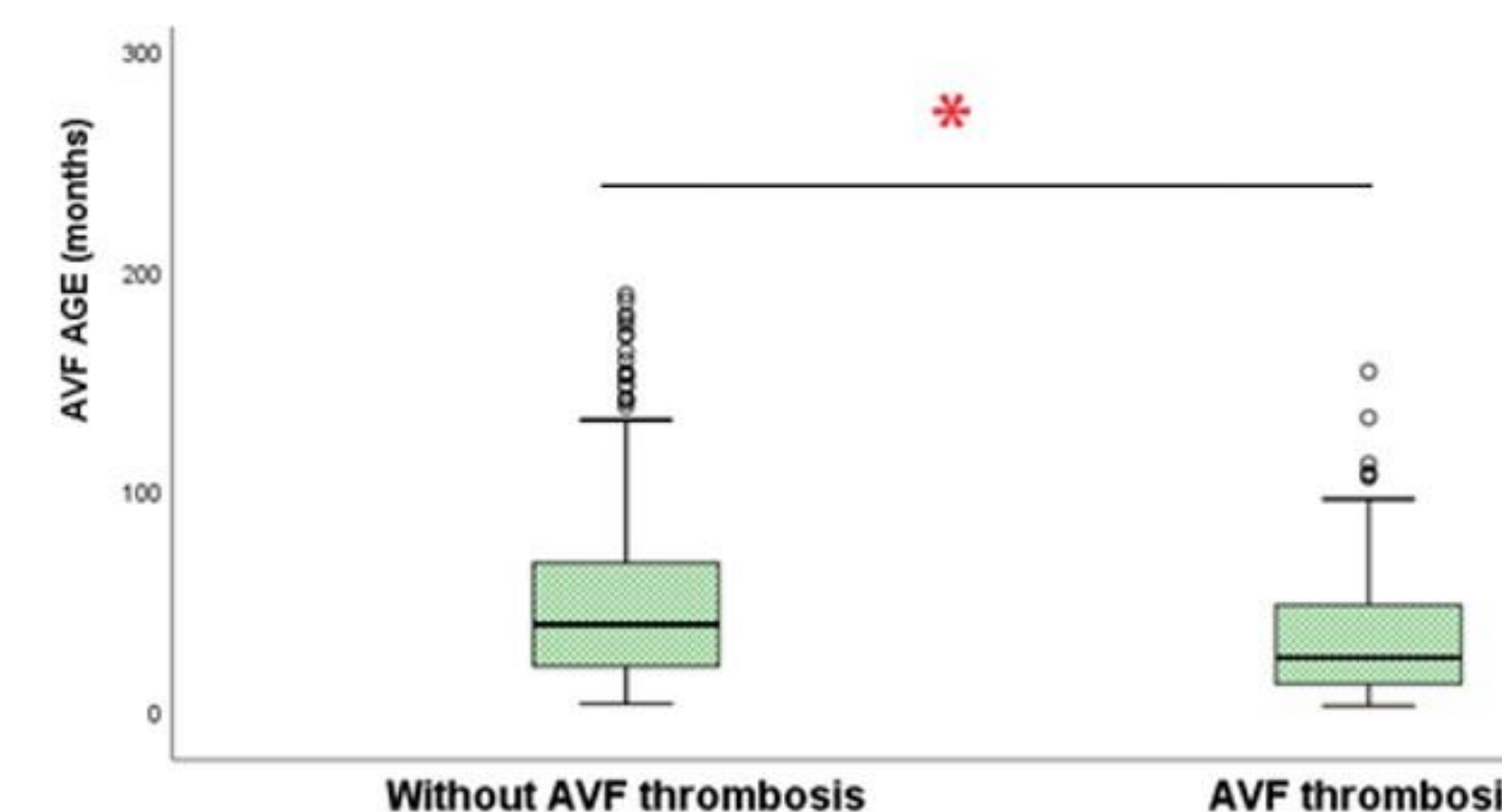
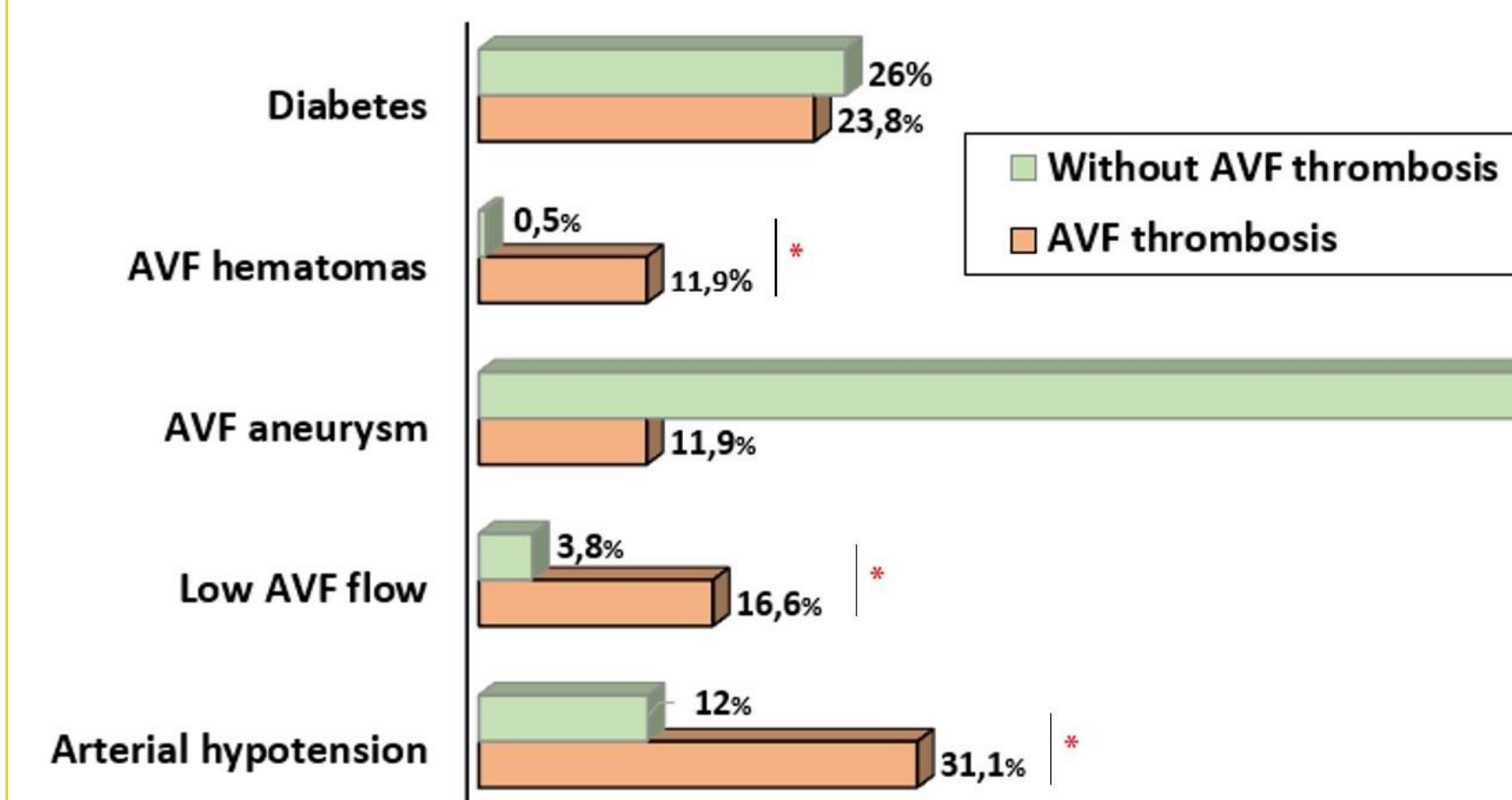
RESULTS



Patients with thrombosis presented a significantly higher percentage of a combination of more than 3 risk factors compared to those without thrombosis



Patients with thrombosis presented a significant shorter fistula age



CONCLUSIONS

Our findings support the need for a standardized AVF thrombosis risk score integrating clinical and access-related parameters, which may allow earlier identification of high-risk patients and targeted preventive strategies in routine hemodialysis care.

ACKNOWLEDGEMENTS

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