

Thromboprophylaxis in acutely ill hospitalized medical patients

The following recommendations are based on a previous article published by the Group in 2003 (1), the last ACCP-Conference (2), the Consensus statement published in International Angiology (3).

These recommendations concern hospitalized patients with an acute medical illness other than those with acute myocardial infarction or those admitted to the critical care unit.

Most of the recommendations included in these guideline documents (1-3) are based upon three large randomized controlled trials (4,5,6). These recommendations should therefore be considered as strong recommendations that can apply to most patients. However, the benefit of prophylactic treatment must be balanced against the risk for each patient, in particular for those who may be at increased risk for bleeding and who have not been properly evaluated in trials such as patients with renal failure, low weight or when treatment is combined with aspirin. For a more complete understanding we refer to the above-mentioned guideline documents (1-3).

It has been shown that decision-making for thromboprophylaxis in current clinical practice is heterogeneous in medical patients (7). This underscores the need for implementing explicit evidence-based criteria for proper identification of patients requiring thromboprophylaxis. The assessment of venous thromboembolism risk presented in the algorithm (figure 1) is based on the inclusion criteria used in a large recently conducted randomized trial (8).

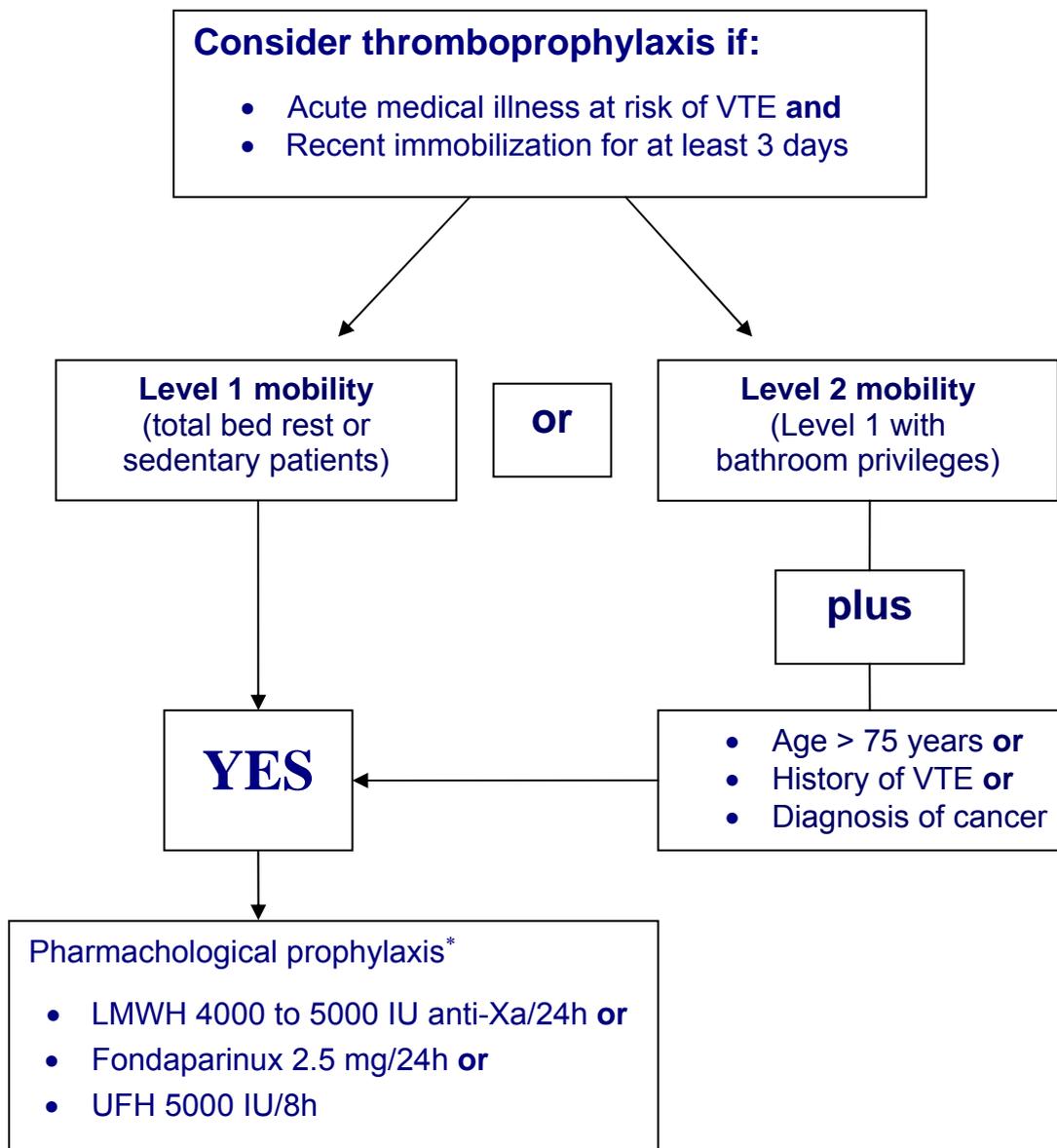
Table 1: Step by step recommendations
Assess systematically the risk of venous thromboembolism in each patient individually
Consider thromboprophylaxis in acutely ill patients with recent immobilization (≤ 3 days) and expected for ≥ 3 days if the reason for admission is one of the medical conditions listed in table 2
Use prophylactic methods listed in table 3 according to the algorithm in figure 1.
Continue treatment for as long as the risk persists

Table 2 : Medical conditions considered at risk of venous thromboembolism
Acute heart failure (NYHA III/IV)
Acute respiratory failure
Severe infection or inflammatory disease
Active cancer
Ischemic stroke with limb paresis
NYHA: New York Heart Association

Table 3 : Recommended prophylaxis	
Agent¹	Dose
LMWH	4000 to 5000 IU anti-Xa/24h
Fondaparinux	2.5 mg/24h
UFH	5000 IU/8h
(1) If pharmacological prophylaxis is contraindicated, graduated compression stockings are recommended	

LMWH: Low molecular weight heparin; UFH: unfractionated heparin

Figure 1. Algorithm for risk assessment of venous thromboembolism in hospitalized medical patients.



* If pharmacological prophylaxis is contraindicated, use graduated compression stockings

VTE: Venous thromboembolism

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References

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