

## **IS HAEMOSTATIC THERAPY THE MOST PROMISING TREATMENT OPTION FOR ICH? - NO**

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Patients with spontaneous intracerebral haemorrhage (ICH) will suffer from haematoma expansion within the first 4 hours in about 30%. This expansion is the most important predictor of the unfavourable outcome after ICH. The mortality rate at 3 months is 50%. Hematoma expansion is even more frequent in patients with ICH that is associated with anticoagulation, where oral vitamin-K antagonists (VKA) play the most important role. The frequency of hematoma expansion in VKA-ICH is about 50%. The idea of haemostatic therapy is to prevent haematoma expansion. Several clotting factors and antifibrinolytic agents have been suggested to enhance haemostasis in patients with ICH and VKA-ICH. But only one substance – recombinant factor VIIa (rFVIIa) – has been tested in 5 randomized controlled trials (RCT) in the indication of spontaneous ICH. The quintessence of this meta-analysis is: Treatment with rFVIIa does reduce hematoma expansion in patients with ICH, but it does not lead to an improvement of outcome, and it is associated with a significant increase of arterial thromboembolic events. No RCT exist for patients with VKA-ICH. Several aspects have been suggested to identify a subgroup of patients with spontaneous ICH of younger age, with smaller haematoma, with a spot-sign, treated within a shorter time, who might profit from treatment. But there are no clinical trials that have looked into this. Currently several other attempts are made to influence outcome of ICH, such as minimal invasive surgery combined with rt-PA-clot-lysis and a trial using tranexamic acid.

Therefore, at this stage, haemostatic therapy is certainly not the most promising treatment option for ICH.