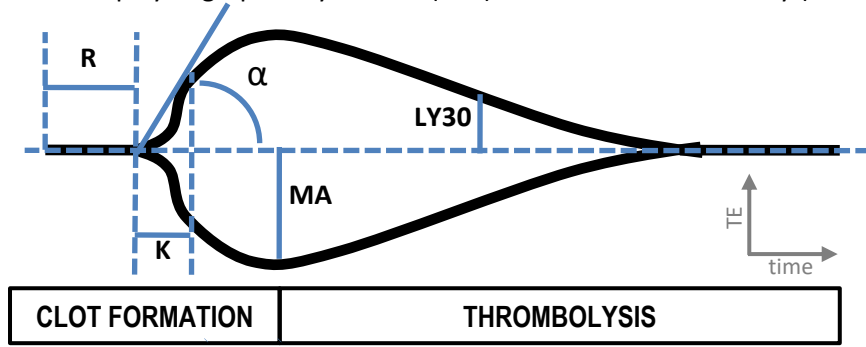


General Principle

- A small cuvette is rotated to simulate sluggish venous flow and stimulate clot formation.
- The resistance to rotation due to the mass of the clot is measured, which allows the kinetics of clot formation to be assessed.
- This provides information about clot formation and breakdown, and also reflects problems with coagulation cascade and platelet function.
- This is displayed graphically as time (min) versus thromboelasticity (in mm).



Explaining the numbers

- **R - reaction time** - latency until clot formation begins as (normal 3-9 min) defined by an amplitude of 2 mm
- **K - K value** - time from the end of R until the clot reaches (normal 0.5 to 3 min) 20mm – reflects speed of initial clot formation
- **α - alpha angle** - the angle tangent to the curve at K (normal 54-80 degrees)
- **MA - maximum amplitude** - reflects total clot strength (normal 51-78 mm)
- **Lysis time (LY30)** - % lysis after 30 min - reflects the (normal 0-9%) fibrinolysis stage of clot development

TEG guided resuscitation protocols

Advantage: Results available promptly: K, R within 5 minutes, MA and α-angle within 15 minutes, and LY30 within 45 minutes.

What do do?

- Increased R time => FFP
- Decreased α angle => cryoprecipitate
- Decreased MA => platelets (consider DDAVP)
- Fibrinolysis => tranexamic acid (or aminocaproic acid)

Specific Pathologies

