Table I. Modified Rankin Scale

Score	Definition
0	No symptoms.
1	No significant disability, despite symptoms; able to perform all usual duties and activities.
2	Slight disability; unable to perform all previous activities but able to look after own affairs without assistance.
3	Moderate disability; requires some help, but able to walk without assistance.
4	Moderately severe disability; unable to walk without assistance and unable to attend to bodily needs without assistance.
5	Severe disability; bedridden, incontinent, and requires constant nursing care and attention
6	Death.

Table II. Different scales.

a	**NIHSS scale** ranges from 0 - 42. No score (0) means normal function, but score in the range of 9 - 24 indicates substantial level of impairment.[84-86]
b	**ASPECTS score** divides the vascular territory of the middle cerebral artery on a CT scan of the brain without contrast into 10 quantitative topographic regions. 1 point is deducted for every region with early ischemic changes. 10 points indicates that no early ischemic changes are seen[87, 88]

Table III.   Indication for thrombectomy in patients with confirmed proximal occlusion / stenosis of middle cerebral artery or the internal carotid artery.

Age: There is no clear evidence for upper age limits for treatment.
Advanced age leads to worse outcome, but the treatment effect is stable throughout the age range.

Underlying diseases: It is important to keep in mind the current quality of life and the ability to maintain it. This may be difficult to assess in the emergency department, but if in doubt, it is better to aim for treatment.

Stroke severity: Patients with an NIHSS ≥6 have a clear benefit from treatment.
No upper limits of severity has been demonstrated on the NIHSS scale.
About 10% of patients with mild symptoms may have large artery occlusion and therefore a CT angiogram should be obtained. These patients are at increased risk of worsening later.[30]
If symptoms are unusual, consider whether the occlusion is old.

Dual vascular problems: There is good evidence for benefit in this group.
It is debatable whether a stent should be placed before or after thrombectomy.
In general, it is logical to remove the thrombus first, thus ensuring collateral blood flow through the circle of Willis, and later treat the stenosis in the internal carotid artery unless it cannot be passed

Benefit of treating distal M2 occlusion is uncertain.

Time: There is a clear benefit for thrombectomy within 0 - 6 hours from symptoms.
Benefit after 6 hours is uncertain.
A randomized study in this group is recommended, but results from ESCAPE[22] and DEFUSE-2[89] suggest benefits if imaging results are favorable.

Infarct core

- Patients with an ASPECTS 6–10 score benefit.
- If patients have an ASPECTS score of 0–5, benefits are unclear. Consider location of ischemic changes and inaccuracy in evaluating unclear changes seen on an CT without contrast (collateral flow on CT angiogram and CT perfusion could be helpful in these circumstances).
- Patients with an ischemic core of < 70 ml on CT perfusion have a clear benefit. If core ischemia is > 70 ml benefit is unclear. Consider the location of ischemic core and patients general conditions (concomitant diseases, patients tolerance for a prolonged rehabilitation) as well as patients wishes (disability tolerance, but keep in mind their views may change after the stroke). Also keep in mind that symptomatic haemorrhage is more common with a larger infarct core.
- MRI perfusion is more accurate than CT perfusion but is time consuming, which needs to be weighed against benefits. Large core ischemia predicts worse outcome but has less impact on treatment benefit than previously thought.

Other imaging parameters

- **Evaluation of collateral blood flow**.

  Patients with good collateral blood flow benefit from thrombectomy.
  It is unclear whether patients with poor or no collateral blood flow benefit.
  Assessment of collateral blood flow on single phase CT angiography can lead to undervaluation of collateral blood flow which, due to its nature, is delayed and therefore not present in the arterial phase of the study.
  Multiphase CT angiography [41] or dynamic time-resolved computed tomography angiography[90] avoids this.

- **Thrombus length**

  No clear evidence exists that a short thrombus is more likely to open up on its own to a justify wait and see approach.