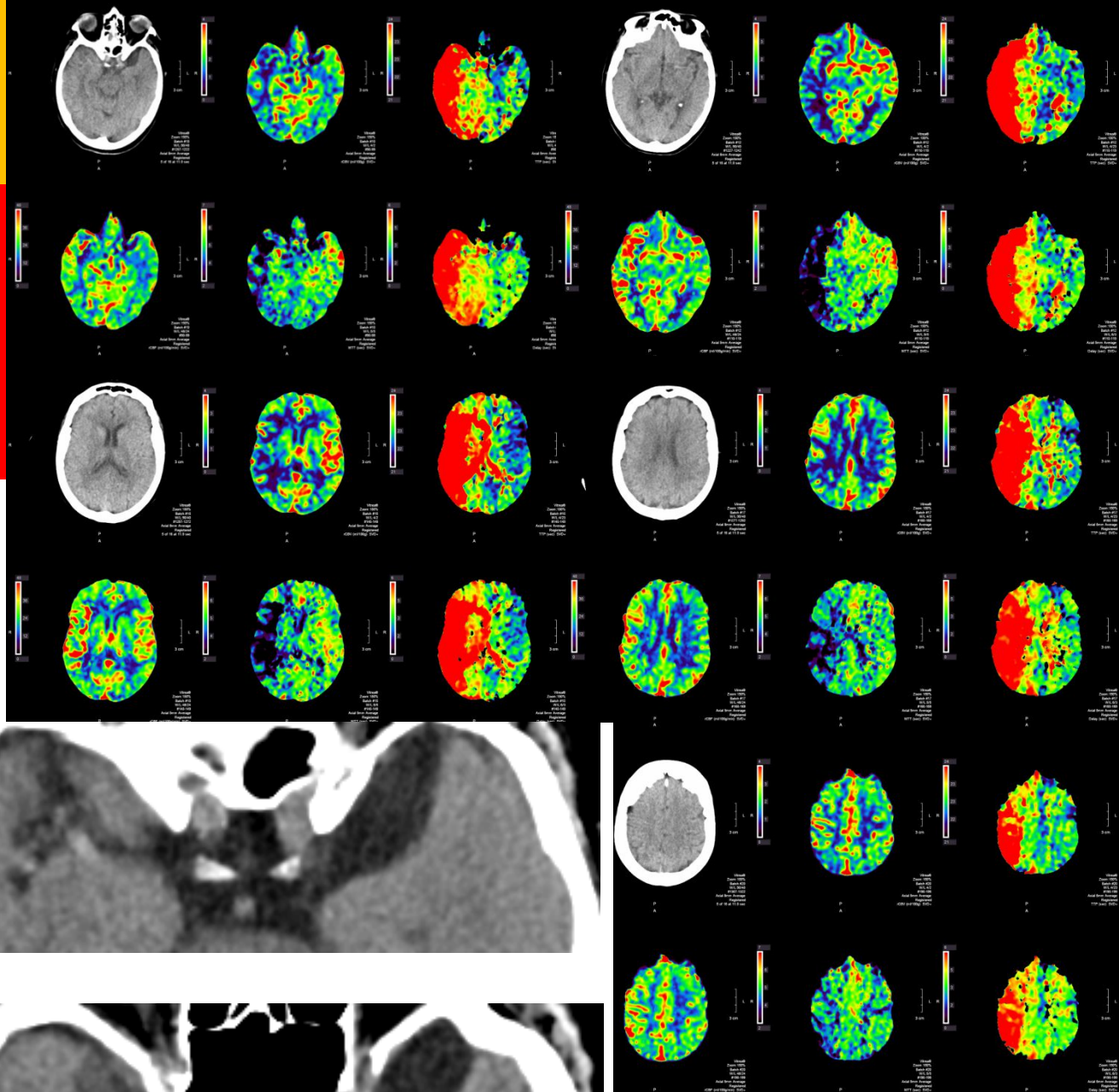
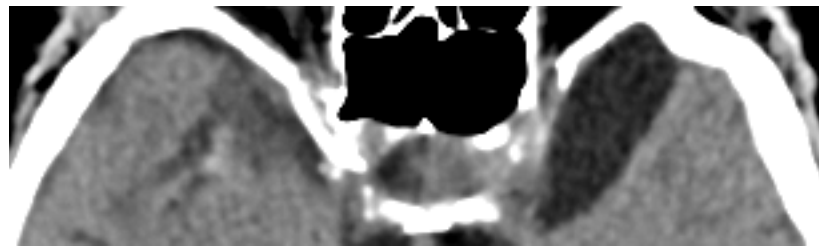
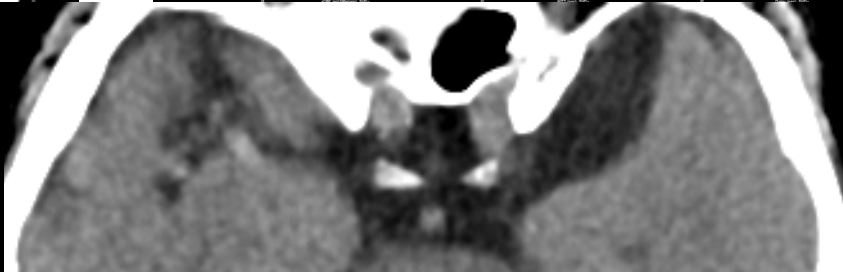


ICTUS ACM-M1- TROMBECTOMÍA MECÁNICA-ONE PASS

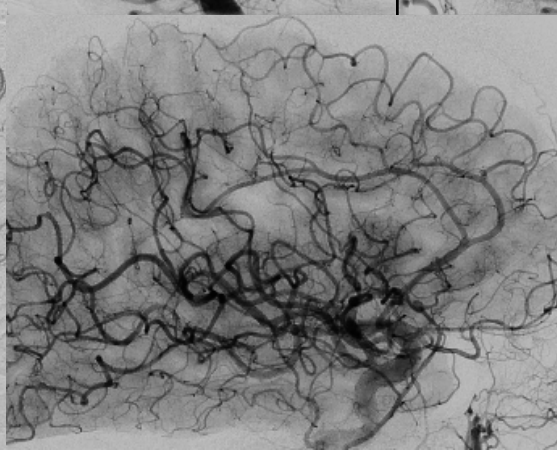
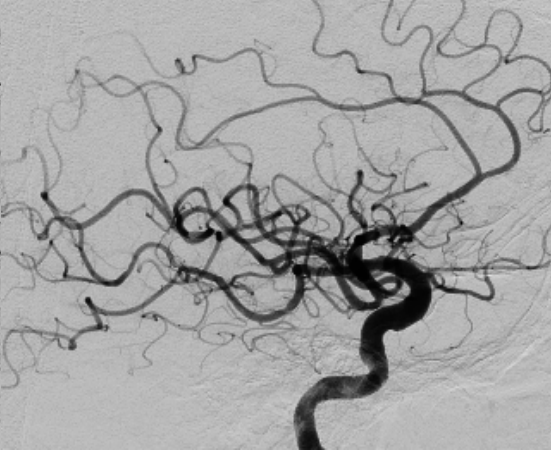
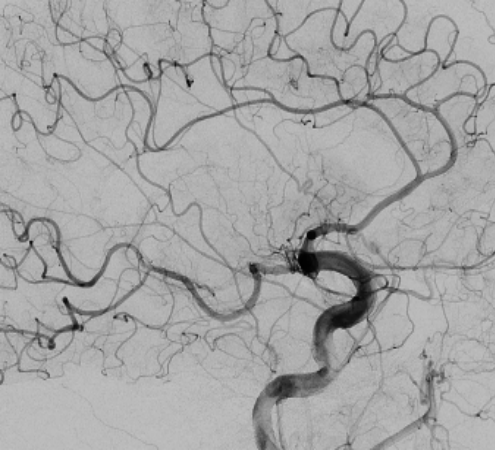
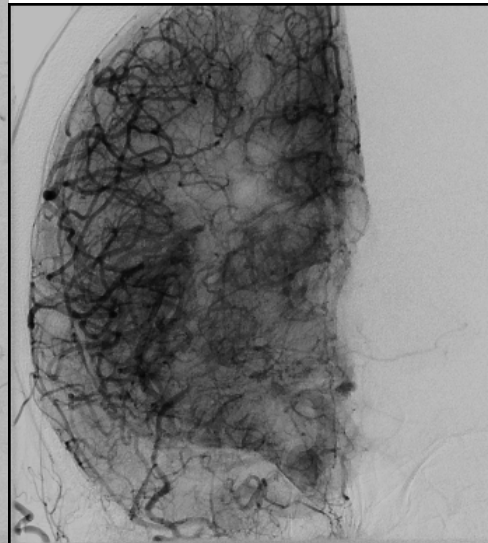
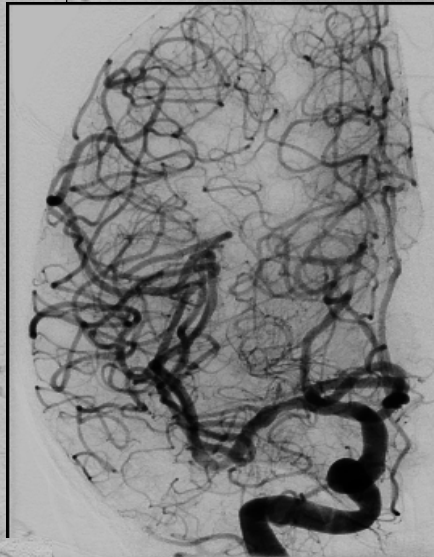
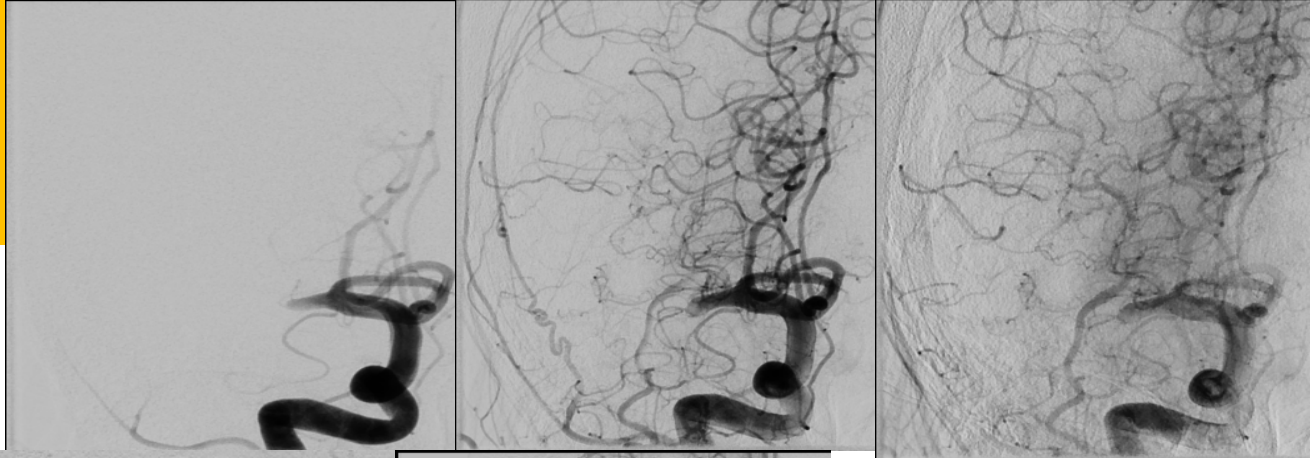
Código Ictus-
Trombosis de ACM en TC.
Perfusión penumbra en territorio de ACM
derecha. Mismatch favorable.
ICTUS ISQUÉMICO EN TERRITORIO ACM
DERECHA. TROMBO M1. FIBRINOLISIS
FALLIDA. TM DE RESCATE.
- HTA



**ICTUS ACM-M1-
TROMBECTOMÍA
MECÁNICA-ONE PASS**

Oclusión de M1-TICI 0.

Trombectomía mecánica, 1 pase
de dispositivo. TICI 3



True First-Pass Effect

First-Pass Complete Reperfusion Improves Clinical Outcome in Thrombectomy Stroke Patients

Omid Nikoubashman, MD; Sven Dekeyzer, MD; Alexander Riabikin, MD; Annika Keulers, MD; Arno Reich, MD; Anastasios Mpotsaris, MD; Martin Wiesmann, MD

Background and Purpose—It has been hypothesized that in stroke patients, complete reperfusion (modified Thrombolysis in Cerebral Infarction; mTICI 3) after a single thrombectomy pass is a predictor for favorable outcome (modified Rankin Scale score, 0–2), but a true first-pass effect defined as improved clinical outcome after complete reperfusion with one versus multiple passes has not yet been specifically addressed in the literature.

Methods—We compared clinical outcome of 164 consecutive patients with occlusions in the anterior circulation and known symptom onset, in whom we achieved complete reperfusion (mTICI 3), depending on whether complete reperfusion was achieved after a single thrombectomy pass (n=62) or multiple thrombectomy passes (n=102). To adjust for confounding factors such as prolonged time spans between symptom onset and reperfusion, additional administration of intra-arterial thrombolysis, and clot localization, we also compared clinical outcome of our first-pass group with a matched cohort (n=54) and a superselective subgroup of first-pass patients (only M1 occlusions, no additional intra-arterial thrombolysis; n=46) with its matched cohort (n=24).

Results—Multivariable analysis of our cohort of 164 nonmatched patients revealed that there was a significant association between first-pass complete reperfusion and favorable clinical outcome ($P=0.013$). This was confirmed in our case-control analyses ($P=0.010$ and $P=0.042$). In our matched cohorts, favorable clinical outcome was seen almost twice as often if complete reperfusion was achieved after one pass (62% and 67% versus 36% and 37%), and odds for favorable outcome were 2.4 to 3.2× higher (CIs, 1.1–4.8 and 1.0–9.9).

Conclusions—First-pass complete reperfusion is an independent factor for favorable outcome and should be aimed for in mechanical thrombectomy. (*Stroke*. 2019;50:2140-2146. DOI: 10.1161/STROKEAHA.119.025148.)

Key Words: humans ■ outcome assessment (health care) ■ reperfusion ■ stroke ■ thrombectomy