

Trombectomía mecánica:

MERCI y MULTIMERCI

Mechanical thrombectomy of intracranial internal carotid occlusion: pooled results of the MERCI and Multi MERCI Part I trials

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Background and purpose: Acute stroke from occlusion of the intracranial internal carotid artery (ICA) generally has a poor prognosis and appears to respond poorly to intravenous thrombolysis. Mechanical thrombectomy is a newly available modality for acute stroke therapy, but it is unknown whether this endovascular therapy may have a role in the specific setting of intracranial ICA occlusion. We therefore assessed the success rate of the Merci Retriever mechanical thrombectomy device in recanalization of intracranial ICA occlusions and sought to determine whether ICA recanalization with this therapy can result in better outcomes. **Methods:** All patients with acute stroke from intracranial ICA occlusion were identified in the MERCI and Multi MERCI Part I trials. We determined the success rate of ICA recanalization with endovascular thrombectomy and then assessed clinical outcomes according to whether vessel recanalization was successful. **Results:** Eighty patients with acute stroke from intracranial ICA occlusion were identified. Of these 80 patients, 53% had successful ICA recanalization with the Merci Retriever alone and 63% had ICA recanalization with use of the Merci Retriever plus adjunctive endovascular treatment. Baseline patient characteristics and procedural complications did not differ between the recanalized and nonrecanalized groups. Good clinical outcome, defined by a modified Rankin Scale of 0 to 2 at 90 days, occurred in 39% of patients with ICA recanalization (n = 19 of 49) and in 3% of patients without ICA recanalization (n = 1 of 30) (P < 0,001; one patient was lost to follow up for 90-day modified Rankin Scale). Ninety-day mortality was 30% (n = 15 of 50) in the recanalized group and 73% (n = 22 of 30) in the nonrecanalized group (P < 0,001). Symptomatic hemorrhage was not significantly different between the recanalized (6% [n=3 of 50]) and nonrecanalized (16,7% [n=5 of 30]) groups (P = 0,14). Hemorrhage rates were also not found to be influenced by use of intravenous thrombolysis before mechanical thrombectomy. Multivariable logistic regression identified ICA recanalization (OR = 28,4, 95% CI = 2,6 to >99.9) and lack of history of hypertension (OR = 0,15, 95% CI = 0,04 to 0,57) as significant predictors of a good 90-day outcome. Failure to recanalize the ICA (OR = 0,16, 95% CI = 0,05 to 0,51) and age (per decade, OR = 1,07, 95% CI = 1,03 to 1.13) were significant predictors of mortality at 90 days. **Conclusions:** Mechanical thrombectomy of acute intracranial ICA occlusion using the Merci Retriever device, alone or in combination with adjunctive endovascular therapy, has a high rate of successful vessel recanalization. Subjects with successful ICA recanalization by this method have improved poststroke clinical outcome and survival compared with subjects in which the ICA is not successfully recanalized.

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s verdad que la presunción de recanalización en ictus isquémico igual a éxito de la técnica (es decir, ERM \leq 2) no está clara, pues no es una correlación tan simple. La recanalización no implica beneficio terapéutico cierto, pues existe una morbilidad del tratamiento en fase aguda asociada a complicaciones hemorrágicas. Pero el sistema que hoy en día puede cambiar las pautas de tratamiento en el ictus isquémico es el sistema de extracción mecánica de trombos Merci®, utilizado en el ensayo multicéntrico no randomizado MERCI¹.

Los pacientes con oclusión de la arteria carótida interna (OACI) intracraneal tienen una alta mortalidad y no suelen responder al tratamiento fibrinolítico, ya sea intravenoso o intraarterial. Se ha realizado un análisis de datos agrupados de los 80 pacientes con OACI de los ensayos MERCI (47 pacientes) y MULTIMERCI (33 pacientes). La edad media fue de 67 años, con una media de NIHSS basal de 20 y un tiem-

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po medio de inicio de tratamiento de 4,1 horas. Un 14% de los pacientes (11 de 80) recibieron rtPA intravenoso. La tasa de recanalización fue del 53% con el empleo de MERCİ, aumentando al 63% con el uso combinado del extractor más trombólisis intraarterial. Pero lo que es más importante, el 39% de los pacientes recanalizados tuvieron buen pronóstico clínico ($Erm \leq 2$) por sólo el 3% de los pacientes no recanalizados ($p < 0,001$). Pero además, la mortalidad del ictus a los tres meses disminuyó del

73% en el grupo no recanalizado a un 30% en el grupo recanalizado ($p < 0,001$). Y todo ello con una transformación hemorrágica sintomática del 6% y el 6,7% en los no recanalizados y recanalizados, respectivamente.

Por primera vez la American Stroke Association (AHA), en su guía para el manejo de los pacientes con ictus isquémico², hace una recomendación de tratamiento endovascular con el extractor de trombos en pacientes con ictus isquémico, con un grado de recomendación IIb y un nivel de evidencia B.

Bibliografía

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