Editorial

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The article by Els et al. in this issue [1], an intervention-oriented randomized study of consecutive patients having ‘malignant ischemic stroke’ utilized current recommendations for early intervention, cited as 15 ± 6 h from clinical onset, National Institutes of Health Stroke Scale scores of >15 (right-hemisphere stroke) and >20 (left-hemisphere stroke), diffusion- and perfusion-weighted MRI showing $>2/3$ of the hemisphere without mismatch, and age <65 years with no prior disability. The efforts, which are hugely consumptive of resources, appear to have been applicable to 25 patients in a 3-year period at one institution.

Evidence that such interventions can save lives dates back well into the last century. In military practice, the outcomes from penetrating head wounds and the effects of limited or extensive debridement on outcome from associated edema still remain unsettled [2], but the large Vietnam Head Injury Study suggests less might yield more in functional outcome [3].

In civilian practice, an intense modern effort is being directed at reducing morbidity in a setting of large middle cerebral artery territory infarction, hoping through early intervention to minimize secondary brain damage from the associated edema. Three companion articles in 2003 all generally accepted the favorable vital prognosis but raised issues of the quality of life in survivors, and called for clinical trials [4]. A recent meta-analysis from our in-

stitution, citing the disappointing 7% of functionally independent survivors, raised the expected concerns for case selection, adequacy of follow-up, and heterogeneous outcome assessments in planning definitive clinical trials [5]. The emerging literature of small, painfully acquired series continues to comment on improved survival, and suggests improving outcomes [6], in some instances measured by the Glasgow Outcome Scores and Barthel Index [7] or the Modified Rankin Scale [8]. However, where cited, also impaired quality of life for many of the survivors was shown [9, 10] which in one study impacted on the decision of patients or family members for or against such a procedure in the future [9].

The current effort for the 25 patients was of Herculean proportions comparable to those recently reported, promoting admiration from this reviewer for the attention to detail, sustained efforts, and assessment of outcomes. Although the results provide ample proof of a high quality of care by the authors, the data for the 25 patients sadly still fail to settle the issue, which is still awaiting the outcome of a large clinical trial. Judging from the lack of publication to date for HeaDDFIRST, the largest planned trial (but no public statement on how many achieved), and the low enrollment plans for the DESTINY, HAMLET, and HeMMI trials (www.strokecenter.org/trials), even these efforts may prove to be or have been underpowered.

References

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