Improving the stats on head injury treatment

[Severe head injury and the risk of early death: GR Boto, et al. JNNP September 2006]

The death rate after severe head injury has remained more or less the same for the past three decades, despite persistent attempts to improve it. Effective treatments have so far proved elusive, but this may be because the research trials have included too many people likely to die soon after sustaining a serious head injury, thereby skewing the findings and providing overly pessimistic results, suggest Spanish researchers.

To offset these trends, they have devised a set of nine criteria, based on readily available x ray and clinical information, which will help to exclude vulnerable patients from research trials. The list is based on head scans of 895 severely head injured patients aged 15 years and older over a period of 12 years.

The findings showed that one in five of these patients died within 48 hours of injury. Internal swelling and widespread high grade injuries were the two strongest predictors of early death. But other factors included paralysis, non-reactive dilated pupils, and age above 65. Use of the criteria correctly predicted early death in 93% of the patients.