THE METHODOLOGY BEHIND A PROSPECTIVE, OBSERVATIONAL STUDY OF THE ECONOMIC BURDEN OF ISCHEMIC STROKE

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OBJECTIVES: To present steps involved in launching the first national, prospective study determining resource utilization and direct (hospitalization, rehabilitation, outpatient, community care) and indirect (lost productivity, caregiver) costs of managing ischemic stroke in the first 6-months post-stroke.

METHODS: A prospective, observational study was designed. A cohort (N = 200) of ischemic stroke patients will be recruited in a consecutive manner by stroke centres across Canada. Ethics approvals will be obtained and a minimum of one neurologist and one study coordinator per centre will participate to identify eligible patients, obtain informed consent, and interview patients. Three sets of questionnaires (baseline, 3-months, and 6-months) will be completed. Questionnaires include clinical and drug histories, stroke severity, disability, resource utilization, depression and utility. Patients will also complete diaries to quantify indirect costs. A pilot study will be conducted to evaluate the study tools. Data collected will be entered electronically via a secure website. RESULTS: Ten stroke centres across Canada (Ottawa, Toronto, Calgary, Montreal, Quebec City, Edmonton, Vancouver, Halifax, Saint John and Thunder Bay) will each recruit 20 eligible ischemic stroke patients into this study. Inclusion criteria such as age, language, neuroimaging evidence and non-interventional clinical trial involvement have been defined in order for the study to be launched on September 26, 2005 (with a 3-month recruitment period) and end July 2006. The primary analysis will provide an overall estimate of costs per ischemic stroke patient. Sub-analyses for atrial fibrillation and severity will also be conducted. CONCLUSIONS: The BURST study will be the first Canadian study that will determine the resource utilization and overall costs of treating ischemic stroke in both acute and post-acute settings with participation from tertiary-based and community-based stroke centres. The economic data collected will be critical for future stroke care funding systems.

THE USE OF MULTI-CRITERIA DECISION METHODS IN HEALTH CARE. DOES METHOD USED INFLUENCE OUTCOME?

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OBJECTIVES: To investigate how the choice of multicriteria decision method influences outcome (ranking criteria and criteria weights). Population. A convenience sample of 28 subjects, 12 healthy and 16 cognitively impaired. METHODS: Based on a literature review, 5 multicriteria methods were chosen for comparison including: Kepner-tregoe analysis (KTA), simple multi attribute rating technique (SMART), SMART using swing weights (SWING), Analytic Hierarchy Process (AHP) and Conjoint Analysis (CA). Four attributes of treatment were identified (impact, duration, and end-result of treatment and associated risks). Subjects were asked to both rank and rate the importance of these attributes with each method. The order of methods was randomized and the total length of the interview was restricted to one hour. Some subjects therefore did not use all methods. Subjects were interviewed either once (n = 14) or twice (n = 14). RESULTS: The highest percentages of rank reversals were found between CA and other methods (55–62%). The lowest percentage of rank reversals was between KTA and SMART (18%). The percentage of rank reversals was significantly higher in impaired population (An average of 54% compared to 36% in unimpaired population). When comparing actual weights, AHP and SMART correlate highly with all other methods except CA. CONCLUSIONS: The high percentages in rank reversal and divergent correlation between individual weights (especially CA compared to other methods) show that the method chosen influences outcome. This has to be taken into account when the ranks or weights are used in multi-criteria decision analysis to make actual treatment decisions. The dissimilar methodology of CA might explain the high percentages of rank-reversals and low correlation between this method and other. Also, the design of the survey might have influenced CA weights and ranking.

THE USE OF MULTI-CRITERIA DECISION METHODS IN HEALTH CARE. WHICH METHOD IS MOST SUITABLE FOR HEALTHY AND COGNITIVELY IMPAIRED POPULATION?

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OBJECTIVES: To select the best multi-criteria decision making method for use with cognitively impaired patients. Population. A convenience sample of 28 subjects, 12 healthy and 16 cognitively impaired. METHODS: Based on a literature review, 5 mult-