Relative risk (RR) of BC mortality with MM used to estimate LE with BC in screened women was synthesized by quality-weighted random effects meta-analysis. The model was designed specifically to incorporate disease-specific mortality into assessment of a general population being screened. Probabilities of each endpoint in a five-year cycle were generated from lifetables and epidemiological sources. Utility-adjustments used BC stage- and duration-specific published values. Sensitivity analyses: to parameters, assumptions, data sources, synthesis methods, and different screening programs. RESULTS: Base-Case Analysis: In the USA, mammography is most cost-effective at age 60, (ICER: $38,876/QALY), being slightly less so at age 40 (ICER: $47,991/QALY). The ICER increases steadily after age 65, to reach its highest estimation at age 80 ($74,665/QALY). Sensitivity analyses demonstrated relative robustness to epidemiological variables, mammography performance, health utility, costs and model assumptions and sensitivity to discount rate. The model was very sensitive to the RR of BC mortality with MM. CONCLUSION: The most cost-effective program was to start annual mammography at age 40, switching to 2-year intervals at 50, and stopping at age 70. This model can be adapted for use in other countries with the relevant data inputs.

PIH14

DESCRIBING YOUR HEALTH TODAY: ANALYSIS OF OPEN ANSWERS IN THE VALIDATION PROCEDURE OF THE ITALIAN EQ-5D (CHILD) VERSION

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OBJECTIVES: To describe children’s views about their Quality of Life (QoL) by means of open-answers, as a part of the validation procedure of the Italian version of EQ-5D(child), within the EuroQoL child-task-force. METHODS: In total, 415 valid children/adolescents sampled from general population (aged 8-15) self-completed a set of instruments/questions including EQ-5D(child), and were asked: a) to explain why they reported having some/a lot of difficulties at each EQ-5D profile domain (if they had), and b) if not, to imagine why youths aged like them might report having difficulties. Textual corpus resulting from open answers was submitted to multiple correspondence analysis (MCA), to show relationships of proximity/distance between the semantic fields associated with each domain. RESULTS: The first factor extracted by MCA (inertia explained: 38.17%) discriminates between words related to the domain 5 (Feeling Worry, Sad or Unhappy: school troubles, relationships with friends, illness/death of close relatives) vs. words related to domain 1 (Mobility: physical impairments, fractures, sprains). The second and the third factors (inertia: 28.83% and 19.89%) discriminate between causes of difficulties at domain 2 (Taking care of myself: mental or physical disabilities) vs. domain 4 (Having pain or discomfort: head-ache, stomach-ache, accident). The last factor illustrates difficulties related to domain 3 (Doing usual activities: tiredness because of sports training, excess of daily commitments, lack of willingness). CONCLUSION: Results show that the current version of EQ-5D(child) profile captures a variety of semantic fields related to children’s well-being, discriminating in particular between social/relational vs. physical aspects of QoL. Analysis of open-answers in the validation project for EQ-5D(child) is allowing the EuroQoL child-task-force to optimize validity and reliability of this instrument for the assessment of QoL in paediatric population.

PIH15

ADJUSTING FOR TRIAL QUALITY IN A META-ANALYSIS

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OBJECTIVES: Meta-analysis of the effect of mammography on breast cancer (BC) mortality, using random effects (RE) inverse-variance weighted techniques, accounting for heterogeneity by incorporating a quality weight into the analysis. METHODS: Raw data were extracted from the most relevant publications of eight RCTs of mammography screening identified through a systematic review. Quality-weighted random effects meta-analysis (QWREMA) estimated the pooled relative risk (RR) of BC mortality in screened vs. control groups, in women under 50, over 50, and of all ages by empirically weighting the between-study variance with a quality score assigned to each trial derived through qualitative review of its supportive literature. The mammography-specific quality rating system contained both scale elements and a component approach. Results were compared to those from fixed effects (FE) and RE methods. Sensitivity analysis assessed the impact of inclusion criteria on the results and cumulative analysis assessed the effect of decreasing order of quality. RESULTS: A significant 20% reduction in BC mortality was observed in women of any age [RR: 0.80(95%CI = 0.72–0.87)], and 22% reduction in women over 50 [RR: 0.78(95%CI = 0.70–0.88)]. Lack of between-study variability in women under 50 reduced the result to a FE analysis: 0.84(95%CI = 0.73–0.97). Results were robust to different weights on algorithm quality domains. QWREMA tightened the RE 95%CI by 10% in the >50 group, and by almost 12% in women of all ages. No specific trend of effect with study quality was observed in women of all ages and women >50. In women <50, 7 studies had to be pooled before a statistically significant beneficial effect was observed. CONCLUSION: Quality scores may be used in a meta-analysis to account for between-study variance due to heterogeneity. The efficacy of mammography in the 40–49 age-group remains in question, and may depend on the number and/or quality of studies included in the meta-analysis.

PIH16

INTERNET SURVEY: A NEW AND VALID TOOL TO ESTIMATE THE BURDEN OF OTITIS IN CHILDREN <5 YEARS OLD

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OBJECTIVES: Evaluate internet-surveys as a tool to estimate the full burden of otitis. METHODS: An internet-survey was conducted February 2007 in The Netherlands (NL) and Belgium (B). Parents of children (<5years) were e-mailed a 17-question-survey about their child’s most recent illness-episode (<1year ago). Data were analyzed for otitis (parent report of diagnosis by medical doctor), and prevalence compared with published figures to assess the validity of internet-survey methodology. RESULTS: A total of 3633 child-illness episodes were analyzed, 2425 from NL and 1208 from B. In NL, 47% parents sought medical-help, a general-practitioner (GP) in 89% of cases; in B 77% sought help, a GP in 76% of cases. Of these episodes 16% were diagnosed with otitis in NL, 14.9% by GPs, comparing well with 16.2% from the Dutch LINH GP-database. In B, 15% of the cases were diagnosed as otitis, 11.6% by GPs, comparing well with 13.6% from the Intego Belgian GP-database. Additionally 10–14% of cases had symptoms consistent with otitis but were diagnosed with another upper respiratory tract infection, additionally 3.6%