

Reflections on the use of DEA: Some fundamental issues

Efficiency and productivity studies based on non-parametric frontier production functions is a research strand accumulating an impressive number of publications with contribution from many countries and is the focus of a number of regular specialised meetings and workshops. However, there are some fundamental issues that are not often addressed in publications. It appears that researchers sometimes rush to estimate efficiency and productivity scores, or delve into mathematical intricacies of DEA formulations without adequately reflecting about the meaning and significance of what they are attempting. The fundamental issues that will be discussed include: Can inefficiency be rationalised; the meaning of dynamic efficiency; the nature of the frontier production function concept; the short-run vs long-run view on efficiency; the aggregation level and the method of aggregation; and, how these issues bear on the measurement of efficiency and productivity.