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Surgeon-level outcomes

here is a dizzying array of registries out there, and they seem to be expanding day by day, churning out huge volumes of data on outcomes, implants, units, and complications. Until relatively recently, these have been used as audit tools – most have been designed to screen for poorly performing units or implants against some readily available audit standards.

Within the United Kingdom, the need for registries was really underlined by the Capital hip fiasco. 1 This resulted, among other things, in the formation of the National Joint Registry (NIR), which is now the largest joint registry in the world and has expanded to report both survivals and outcomes. The registry is no longer just for hips and knees; it also includes ankles, elbows, and shoulders. Shortly, a ligament registry will also be available. Hand in hand with the growth in volume of data collection and the relevance of registry reports to our everyday practice, many of these registries inside and outside of orthopaedics now report surgeon-level data. This has opened the debate surrounding the number of joints one needs to operate on annually. It is worth noting, however, that hip and knee arthroplasties are more commonly performed than elbow, shoulder, or ankle arthroplasties. As such, a target of n operations per year would be easier

to achieve for hip and knee joint arthroplasty surgeons.

We are not, as orthopaedic surgeons, beholden only to the NJR. We must also consider the Trauma Audit Research Network registry² and the National Hip Fracture Database,³ which, like the NJR, require compulsory submission within the NHS, link to billing data in the form of Hospital Episode Statistics (HES), and have long-term outcomes for units, patients, and surgeons.

Therein lies the problem that many of us perceive. Although the temptation of all orthopaedic surgeons is to assume that we are each above average, only half of us can possibly be so. If we are reporting on three registries (as anyone performing joint arthroplasty and on call in a major trauma centre will be), then it seems likely that the vast majority of surgeons will be below average on one of these registries. This may be easy to understand as a surgeon, but may be an unpopular idea for the public to accept.

It was heartening, then, to read a report in *The BMJ* this month that deals with the difficulties of surgeon-level outcome data in relation to colorectal cancer.⁴ The authors established that the surgeons did not shy away from the difficult cases, nor did they 'over-report' the comorbidities of their patients. However, the effect of reporting surgeon-level data appears

to have improved outcomes beyond the expected rate in this study of cancer patients. This in itself is hard to explain, although we know from both audit and research studies that patients do better for being observed (the Hawthorne effect). To find that patients live longer after their cancer resection thanks to the simple intervention of reporting the results makes the angst associated with the process worth it. This observation clearly needs more investigation, but it seems likely that the collective focusing of the mind onto one's outcomes is responsible for this improvement.

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