

Editorial

Seeing the unseen: Indicators for clinicians-educators-researchers-administrators

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The practice of eye care demands more than clinical expertise, irrespective of whether one is practising in the public or private sector. At the different stages in our careers, we are called upon to be clinicians, researchers, educators, and administrators; often simultaneously and integrated, rather than separately. This multifaceted role, while challenging, presents a unique opportunity to shape eye care delivery, advance knowledge, and nurture future generations of the eye care workforce.

The success of ophthalmology and eye health is usually measured through indicators such as improvement in service coverage (for example, cataract surgical coverage), the density of eye health workers per population, prevalence of ocular conditions and visual impairment, visual outcomes after interventions and other parameters. These indicators are measured at the population, institution, or health system level. Some indicators are also applicable at the individual level, for example, cataract surgical outcomes by surgeon. Given that all eye health workers are clinicians by training, most of these health system indicators are primarily applicable to the clinical role.

The pathway from graduation to retirement requires clinicians to operate in distinct systems, including clinical practice, education and training, research, and administration (including leadership, management, and regulation). It is known that there is a need to increase the capacity and capability of clinicians to succeed in all these roles. It is also known that multiple roles increase the workload, even though clinicians have insufficient time and training for some of these roles. The level of success of clinicians in these heterogeneous roles is not routinely tracked and would necessitate the identification of indicators that are relevant to each distinct role. Recognising the lack of a curated list of such indicators, in this editorial, we share a few examples that you can explore for clarity. We conclude with a call for clinicians to monitor these parameters and to discuss potential composite indicators, particularly those relevant to ophthalmology.

Indicators for clinical practice:

- (1) Adherence to best practices, clinical guidelines, or protocols, such as guidelines for the management of ocular allergy, ocular injuries, red eye, glaucoma, diabetic retinopathy, retinopathy of prematurity, retinoblastoma and other conditions
- (2) Treatment outcomes – including pain control, visual outcomes, ocular complications, patient satisfaction, quality of life and other outcomes
- (3) Clinical data – quality of data documentation and reporting
- (4) Population health parameters, including exposure to risks to eye health
- (5) Contribution to clinical teams, e.g. infection control committees

Educators (with or without formal teaching appointments in the classroom or clinical teaching) need to assess their contribution to:

- (1) Patient and public education: patient education materials, programs and messages
- (2) Continuing professional education for peers and other health workers
- (3) Clinical teaching for undergraduate and postgraduate students
- (4) Curriculum design and innovation/teaching and learning resources development
- (5) Student mentorship and supervision
- (6) Student performance in assessments
- (7) Student-reported outcomes in the evaluation of teaching and courses

The contribution of researchers can be measured through:

- (1) Participation at scientific symposia, conferences and professional meetings as speakers, reviewers, session moderators, members of scientific committees, and in other roles
- (2) Peer-reviewed publications: volume and impact
- (3) Scientific journal work: peer review and editorial work
- (4) Grant funding

- (5) Teaching on research methodology
- (6) Curating relevant research resources

Administrative (leadership, management and regulatory) contribution can be measured through parameters such as:

- (1) Efficiency of operational processes
- (2) Quality improvement and quality assurance
- (3) Team effectiveness and productivity
- (4) Institutional performance, such as financial performance
- (5) Contribution to policies, strategies, regulations and other tools
- (6) Service indicators such as waiting time, length of hospital stay, readmission rate, referrals, satisfaction with care and patient safety.
- (7) Stakeholder engagement, including patient and community engagement

Reliable and valid data documentation for these parameters at the individual level is essential. Such documentation has the potential to reveal the added value of the multiple roles, which may not otherwise be obvious even to the individual clinician. Is the number of indicators overwhelming? At

present, we do not have explicit composite or aggregate measures, but the opportunities abound to change this. Composite indicators have profound popularity and convenience, as they combine multiple individual indicators into an aggregate measure. The indicators can be assigned individual weights (weighted), such that more critical indicators have higher weight.

A composite indicator provides a summary 'big picture' measure of eye health, facilitating the understanding of complex issues and providing a more reliable assessment of eye health. Weighting and aggregating facilitates a focused approach, such that effort and resources are directed to the areas with the greatest impact on eye health, without neglecting other indicators. Is it feasible to weight and aggregate some of the distinct indicators and develop a composite indicator?

We recommend that all eye health professionals should embrace the integration and synergy of clinical care, research, education, and administration and leadership for our eye health services to prosper.

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