



Comment on the Review: Clarifying Steroid-Associated Glaucoma—From Association to an Actionable Closed-Loop [Letter]

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Dear editor

We read with great interest the review by Belletti et al on the safe use of corticosteroids in noninfectious uveitis (NIU).¹ The section on steroid-associated glaucoma (SAG) is highly relevant to day-to-day decisions. As this is a narrative review, we suggest targeted refinements to make the message both evidence aligned and clinic ready:

1) Causality wording aligned to evidence. Signals of glaucoma progression despite on-target intraocular pressure (IOP) in eyes receiving long-acting intraocular steroids should be framed as associations from longitudinal data rather than established causality; mechanisms remain to be proven prospectively. Recent long-term analyses of modern fluocinolone acetonide implants underscore sustained inflammation control while highlighting vigilance for IOP events.^{2,3}

2) Close the loop with a concrete surveillance pathway. To operationalize indefinite monitoring, we propose a closed-loop algorithm specifying time points, metrics, and action thresholds (Figure 1). Contemporary evidence syntheses on uveitic macular edema (UME) management emphasize structured surveillance paired with route de-escalation when risk emerges.⁴

3) Risk-weighted route selection. Quantified IOP and glaucoma risks reported for intravitreal steroids should feed directly into the route algorithm (intravitreal greater than periocular for IOP events; higher risk with long-acting implants). In historical fluocinolone 0.59 mg implant cohorts, IOP-lowering medication was required in roughly 70–80% and glaucoma surgery in about 30–40% of eyes, whereas modern 0.18–0.2 mg inserts achieve durable recurrence control with markedly lower—yet nontrivial—IOP event rates (IOP-lowering medication in approximately 30–40% and surgery in about 5–10%). High-risk phenotypes—prior steroid responder, filtering surgery, narrow or closed angle, pediatric or young age, myopic small disc—should therefore favor systemic therapy with or without short-acting local steroid, reserving long-acting implants for unilateral disease or systemic contraindication with intensified surveillance.⁴

4) Alternative local route positioning. Suprachoroidal triamcinolone acetonide may be presented as a lower-IOP-risk option for prior steroid responders or glaucoma suspects with the explicit caveat of shorter follow-up; recent systematic evidence supports this positioning.⁵

These refinements can be incorporated without altering the thrust of the review while substantially improving its translational value.

Data Sharing Statement

No new data were generated or analyzed.

Closed-Loop Surveillance and Intervention for Steroid-Associated Glaucoma in NIU

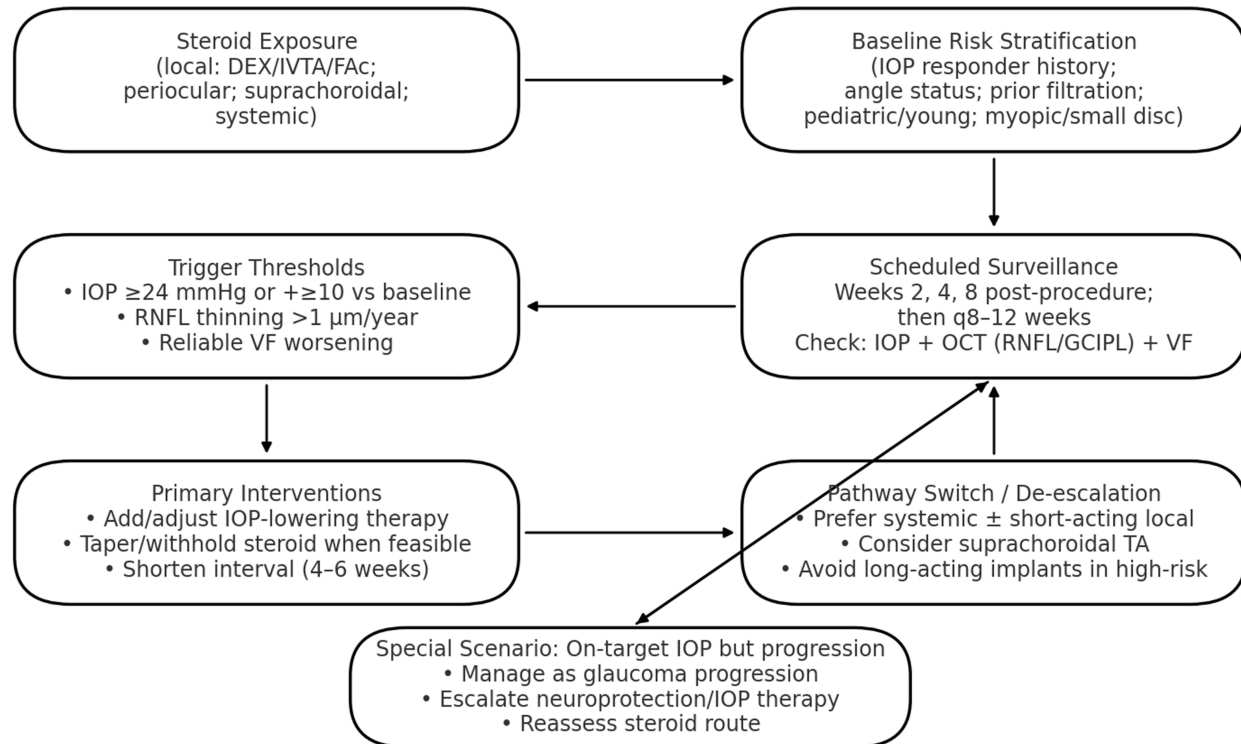


Figure 1 Closed-loop surveillance and intervention for steroid-associated glaucoma in NIU.

Author Contributions

Luxing Xu AND Xin Chen: Conceptualization, Writing – original draft, Writing – review & editing. Guanghui Liu: Conceptualization, Investigation, Writing – review & editing.

All authors gave final approval of the version to be published; have agreed on the journal to which the article has been submitted; and agree to be accountable for all aspects of the work.

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Disclosure

The authors declare no conflicts of interest.

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