Glucocorticoids in Rheumatoid Arthritis (RA): Advances in Balancing Risks and Benefits

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Dr. Saag has provided a thorough and timely review of the double edge sword that is glucocorticoids. From a clinician’s perspective I think the discussion on glucocorticoids is sorely needed. I recently heard Dr. Arthur Kavanaugh say something like “if you ask me how many RA patients I have on steroids I would probably tell you about one in three, but if you audit my charts it would probably be more like 50 or 60 percent”. Why is this?

Most of us have been trained in the post steroid discovery era when we found the profound and reproducible toxicities of long term high dose use. We have been sensitized. However, as Dr. Saag points out, not only is there growing data on the efficacy of adding ‘low dose’ glucocorticoids to an RA regimen, the counterbalancing safety signal is both reasonable and manageable. Guidelines from EULAR and ACR now help us manage the use and monitoring of glucocorticoid therapy and their attendant complications (1,2). The EULAR recommendations, published in 2010, were based on a systematic literature review, which concluded that the additions of glucocorticoids to either standard synthetic DMARD monotherapy or combinations of synthetic DMARDS, yielded clinical benefits and inhibition of radiographic progression. Specifically, in early RA, the addition of low-dose glucocorticoids (<7.5 mg/day) to DMARDs led to a reduction in radiographic progression; in longstanding RA, glucocorticoids (up to 15 mg/day) improved disease activity. The 2010 ACR recommendations for the prevention and treatment of glucocorticoid-induced osteoporosis support using the smallest dose of glucocorticoids for the shortest duration possible. While the evidence was insufficient to make disease-specific recommendations for RA patients, it was recommended that individuals requiring glucocorticoid therapy for ≥ 3 months and at doses ≥ 7.5 mg/day, should receive concomitant alendronate, risedronate or zoledronic acid.

Overall the message is clear. When glucocorticoids are needed:

- Keep the dose to less than 10 mg per day and if possible 5 mg or less per day
• Pay attention to common comorbidities by monitoring high risk patients or those on high risk dosing regimens
• For those at defined risk, institute measures to detect and prevent bone loss

The combination of low dose glucocorticoids with DMARDS has been studied in a number of clinical trials providing evidence of the beneficial effects of glucocorticoids on radiographic progression and disease activity. Balancing the risks and benefits of glucocorticoid treatment has resulted in efforts to improve these drugs and find ways to optimize their delivery while reducing toxicity and increasing their efficacy.

References
