Statin Use and Osteoarthritis

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To the Editors:—Kadam and colleagues present an interesting observational study showing improved outcomes in osteoarthritis patients taking statin therapy, and discuss the potential role of lipid metabolism in the pathogenesis of the disease.¹ However, the data also contributes to a growing evidence base supporting the pleiotropic effects of statins, which has been a topic of interest for vascular biologists and clinicians alike. Clearly, the potential public health impact of increasing the use of these well-established agents is vast.

The TARA trial demonstrated that rheumatoid arthritis patients randomised to atorvastatin not only exhibited improved lipid profiles, but additionally had significant reductions in inflammatory markers and disease activity scores.² Researchers have also investigated the possibility of using statins in inflammatory conditions as diverse as psoriasis³ and multiple sclerosis,⁴ although the evidence remains limited. Hypotheses about the mechanisms of these anti-inflammatory effects include the inhibition of pro-inflammatory cytokines and reduced T cell activation.⁵

With a growing appreciation that osteoarthritis is at least partially driven by inflammation rather than being an exclusively degenerative disease, perhaps the prevailing message from these data should be a reaffirmation of the

potential use of statins in systemic inflammatory conditions. Clinical trials and cost analyses are needed to conclusively decide on the feasibility of using statins as anti-inflammatory agents in osteoarthritis patients and in a variety of other disease groups. In an era where clinicians are facing multimorbidity, polypharmacy and medication non-adherence, further investigation into this area is surely warranted.

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