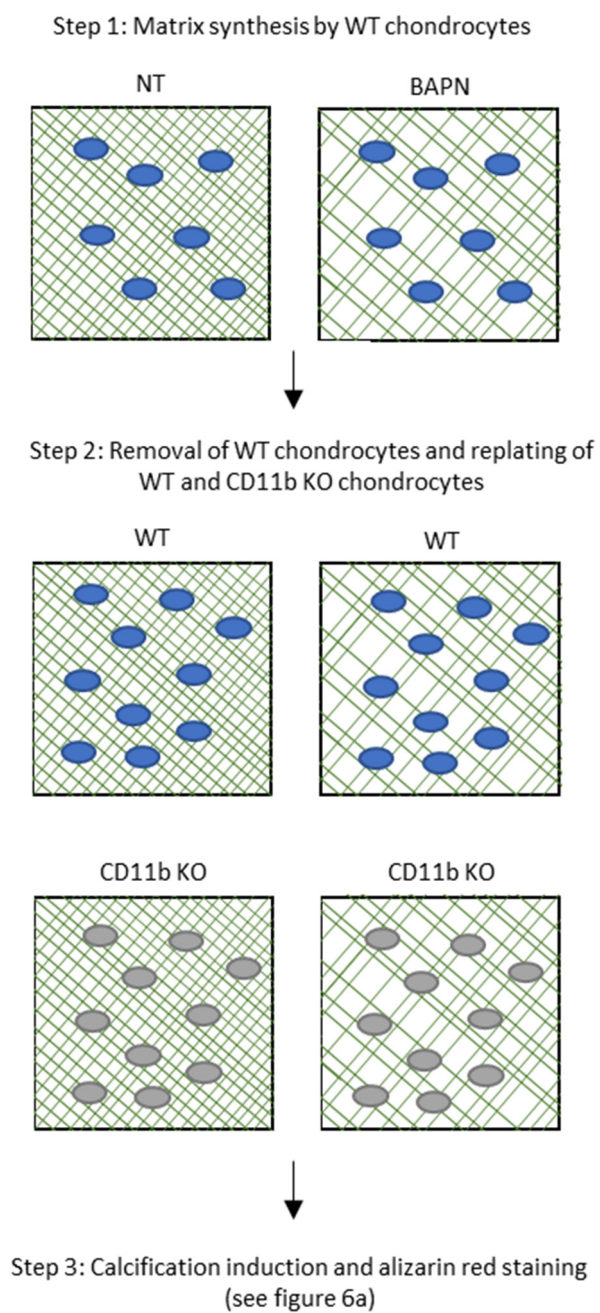




| GEO       | Date | Author            | Database main focus   | Model and number of patients/animals         | CD11b gene expression |
|-----------|------|-------------------|---|--|-----------------------|
| GSE114007 | 2018 | Fisch KM et al.   | Identification of transcription factors responsible for dysregulated networks in human osteoarthritis cartilage by global gene expression analysis                | Human knee cartilages<br>20 OA vs. 18 normal | Yes                   |
| GSE117999 | 2018 | Rai MF et al.     | Transcriptome comparison of cartilage from patients with and without osteoarthritis   | Human knee cartilage<br>12 OA vs. 12 non-OA  | Yes                   |
| GSE104782 | 2018 | Ji Q et al.       | Single-cell RNA-seq analysis reveals the progression of human osteoarthritis  | Human knee chondrocytes<br>10 OA             | Yes                   |
| GSE151937 | 2020 | Datta P et al.    | mRNA sequencing of human osteoarthritis chondrocytes treated with or without autotaxin inhibitor  | Human knee chondrocytes<br>4 OA              | Yes                   |
| GSE171952 | 2021 | Mimpen JY et al.  | Interleukin-17A causes osteoarthritis-like transcriptional changes in human osteoarthritis-derived chondrocytes and synovial fibroblasts in vitro                 | Human knee chondrocytes<br>24 OA             | Yes                   |
| GSE172291 | 2021 | Liang T et al.    | Inhibition of nuclear receptor ROR $\alpha$ attenuates cartilage damage in osteoarthritis by modulating IL-6/STAT3 pathway  | Human knee chondrocytes<br>8 OA vs 8 non-OA  | No                    |
| GSE85254  | 2017 | Weinmann D et al. | Galectin-3 Induces a Pro-degradative/inflammatory Gene Signature in Human Chondrocytes, Teaming Up with Galectin-1 in Osteoarthritis Pathogenesis                 | Human knee chondrocytes<br>4 OA              | Yes                   |
| GSE150411 | 2020 | Reed KS et al.    | Transcriptional response of fibronectin fragment treatment in human articular chondrocytes  | Human ankle chondrocytes<br>3 OA             | Yes                   |
| GSE111357 | 2019 | Young DA et al.   | Osteoarthritis RNA Sequencing from ground cartilage samples   | Human hip cartilage<br>10 OA vs 6 non-OA     | Yes                   |
| GSE57218  | 2014 | Ramos YF et al.   | Gene expression profiles from joint-matched macroscopically intact and OA affected cartilage of patients undergoing joint replacement surgery due to end-stage OA | Human knee and hip cartilage<br>33 OA        | Yes                   |

**Table S1.** Analysis of open access GEO databases on human and murine cartilage gene expression. Expression of ITGAM was assessed by number of reads (> 10).



**Figure S1.** Two-steps experiment graphical explanation.