

Supplementary Figure 1. Schematic diagram for transwell system.

The secretion of cytokines TGF- β , IL-10, IL-8 and CCL-20 was measured in the lower compartment.

Supplementary Figure 2. Surface phenotype of immature DCs or after exposure to LPS.

(A) Flow cytometry strategy for dendritic cells. DCs were gated in the FSC/SSC plot. The purity of the DCs was assessed using a marker highly specific of the DC lineage, the DC-SIGN, and was always above 90%. (B) Representative flow cytometry plots showing DC-SIGN/CD86 dot plots and histograms for the presented markers (CD83, CD86, CD14, CD206, DC-SIGN and HLA-DR). (C) Differential expression of human DCs membrane marker expression after indirectly exposure through the vaginal epithelial cell monolayer to UV-inactivated *G. vaginalis* (MOI 10) alone or UV-inactivated Lcr35 (MOI 1-100). Values are the means \pm SEM; n= 5; *p< 0.05 compared with non-infected DCs.

Supplementary Figure 3. Effect of Lcr35 on *G. vaginalis*-infected dendritic cells.

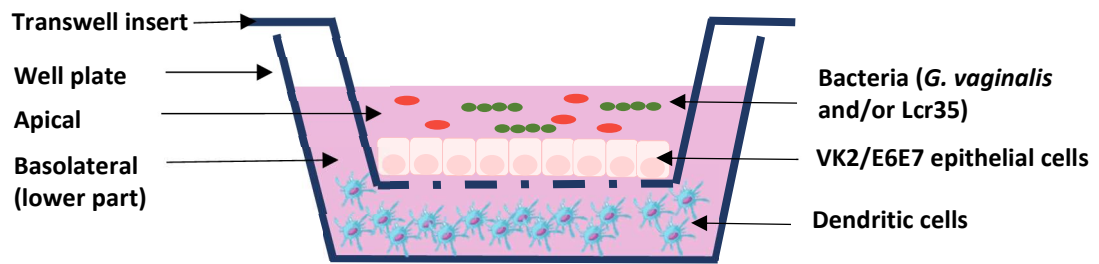
Human monocyte-derived DCs were exposed directly to UV-inactivated *G. vaginalis* (MOI 10) alone or UV-inactivated Lcr35 (MOI 1-100) for 48 hours. The effects of DCs functional maturation were determined by measuring the DCs-surface expression of DC-SIGN (black bars) and CD86 (white bars) by flow cytometry. Values are the means \pm SEM; n= 4; *p< 0.05; **p< 0.01 compared with non-infected DCs.

Supplementary Figure 4. Viability of vaginal epithelial cells in response to Lcr35 +/- *G. vaginalis*.

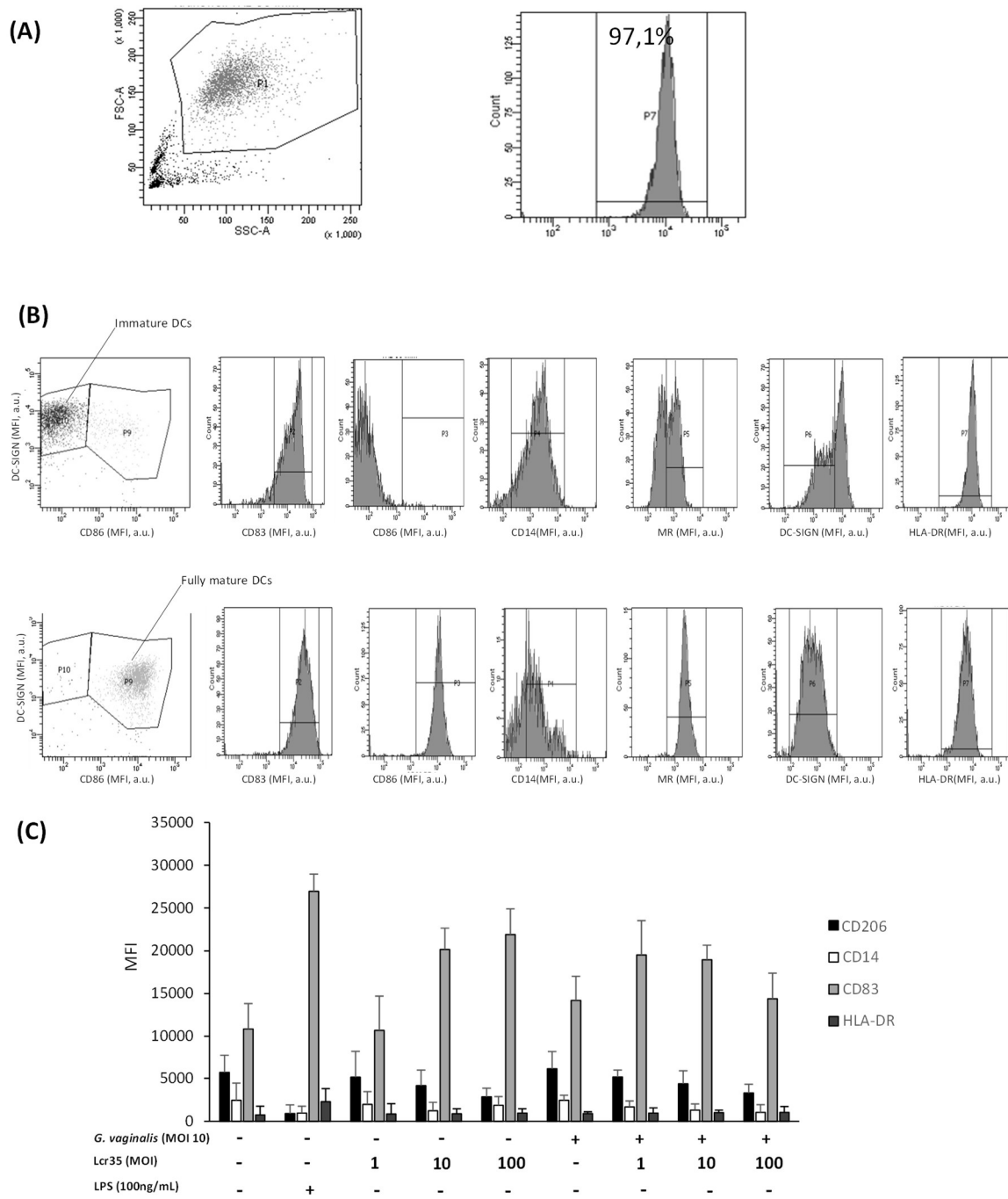
MTT assays were performed to measure the viability of VK2 cells 6h after exposure to bacteria. Cell viability was expressed as percentage of the viability of control cells, assigned as 100%. Values are the means \pm SEM; n= 4.

Supplementary Figure 5. Comparison of production IL-8 (A) and SLPI (B) by VK2/E6E7 vaginal epithelial cells after incubation with different *Lactobacillus* strains: Lcr35, *L. vaginalis* CIP 105932, *L. gasseri* CIP 102991-43, *L. plantarum* CIRM653 and *L. crispatus* BLL2005.

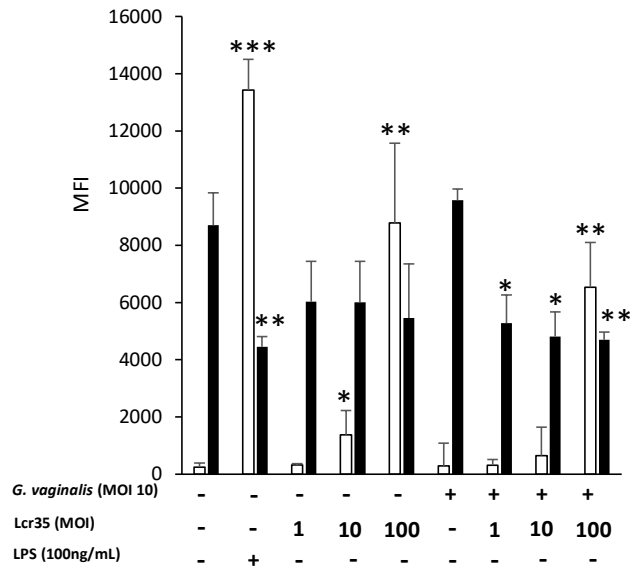
Supplementary Figure 6. Uncropped western blot figures.



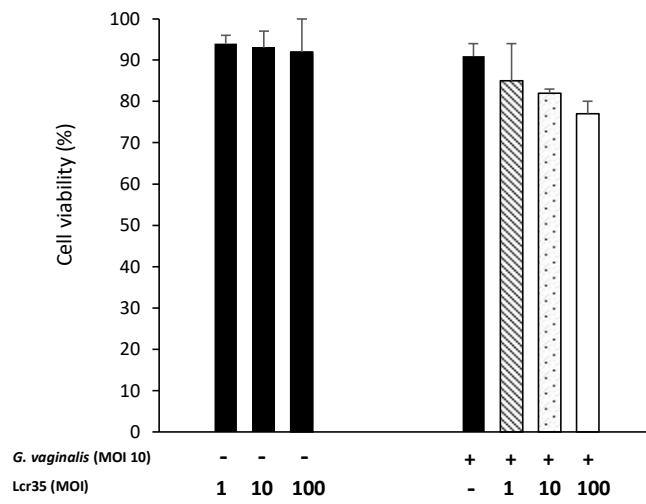
Supplementary Figure 1



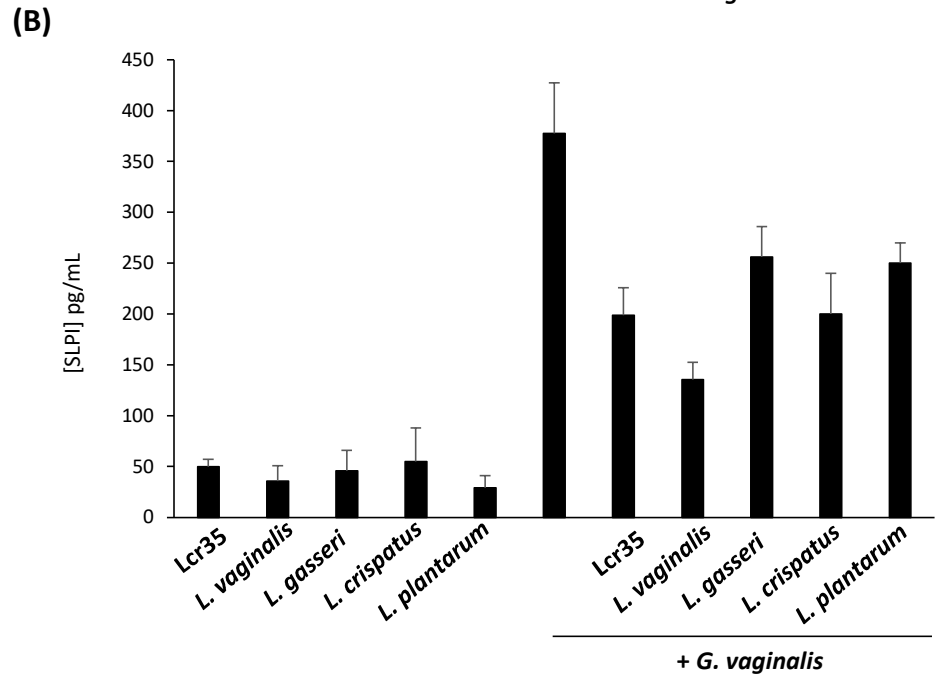
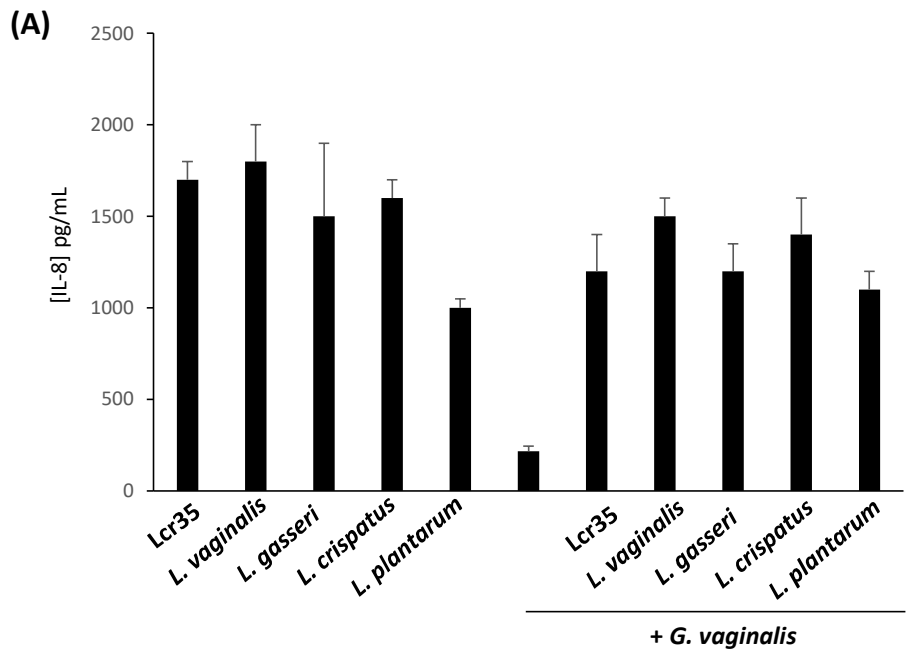
Supplementary Figure 2



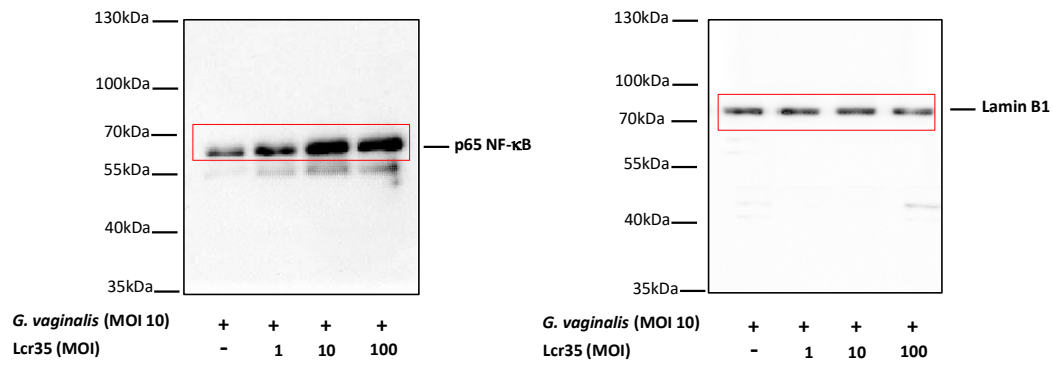
Supplementary Figure 3



Supplementary Figure 4



Supplementary Figure 5



Supplementary Figure 6.