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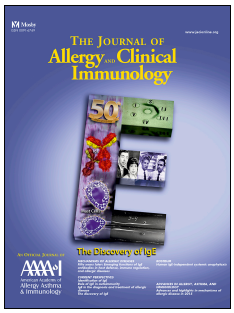

Human mast cells as antigen-presenting cells: when is this role important *in vivo*?

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In this issue of JACI, Lotfi-Emran et al.[1] report that interferon-γ (IFNγ)-primed human skin-derived mast cells can take up and process antigens and act as antigen-presenting cells (APCs) *in vitro*. Such APC function was demonstrated using the Jurkat T cell line and, more importantly, with autologous $CD4^+$ T cells. In addition to inducing *S. aureus* superantigen-dependent T cell responses, IFNγ-primed mast cells from CMV-seropositive donors took up CMV antigen and activated recall responses and IFNγ production in autologous CMV-specific $CXCR3^+CD4^+$ T cells, thereby pointing toward a potential "feed-forward loop of Th1 cell-mast cell cross-activation". Finally, the authors provided evidence that mast cells can take up soluble or particulate antigens in an IFNγ- and IgG opsonization-independent manner and that mast cells could "co-opt" their protease-containing secretory granules for antigen processing and presentation.

The idea that, in addition to being versatile effector cells of innate and adaptive immune responses, mast cells might also function as APCs is not new and initially generated some