

# Molecular nature of the antigenic entity transferred from antigen donor cell to antigen presenting cells during cross presentation

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## Abstract

Cross presentation involves, among other steps, transfer of antigen from the antigen expressing or antigen donor cell to the professional antigen presenting cells (1). There is considerable discussion about the nature of the antigenic entity that is transferred. It has been argued that the intact antigen itself is transferred and processed further within the antigen presenting cells (2, 3). Another line of inquiry suggests that the antigen is processed within the antigen expressing cell and the peptides generated within such cell constitute the form of antigen transferred to the antigen presenting cells (4-6). Our recent studies (7, 8) have led to observations that unify the conflicting reports in the literature and demonstrate that generation of peptides in the antigen donor cell is essential for cross presentation of ovalbumin-derived SIINFEKL epitope.

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