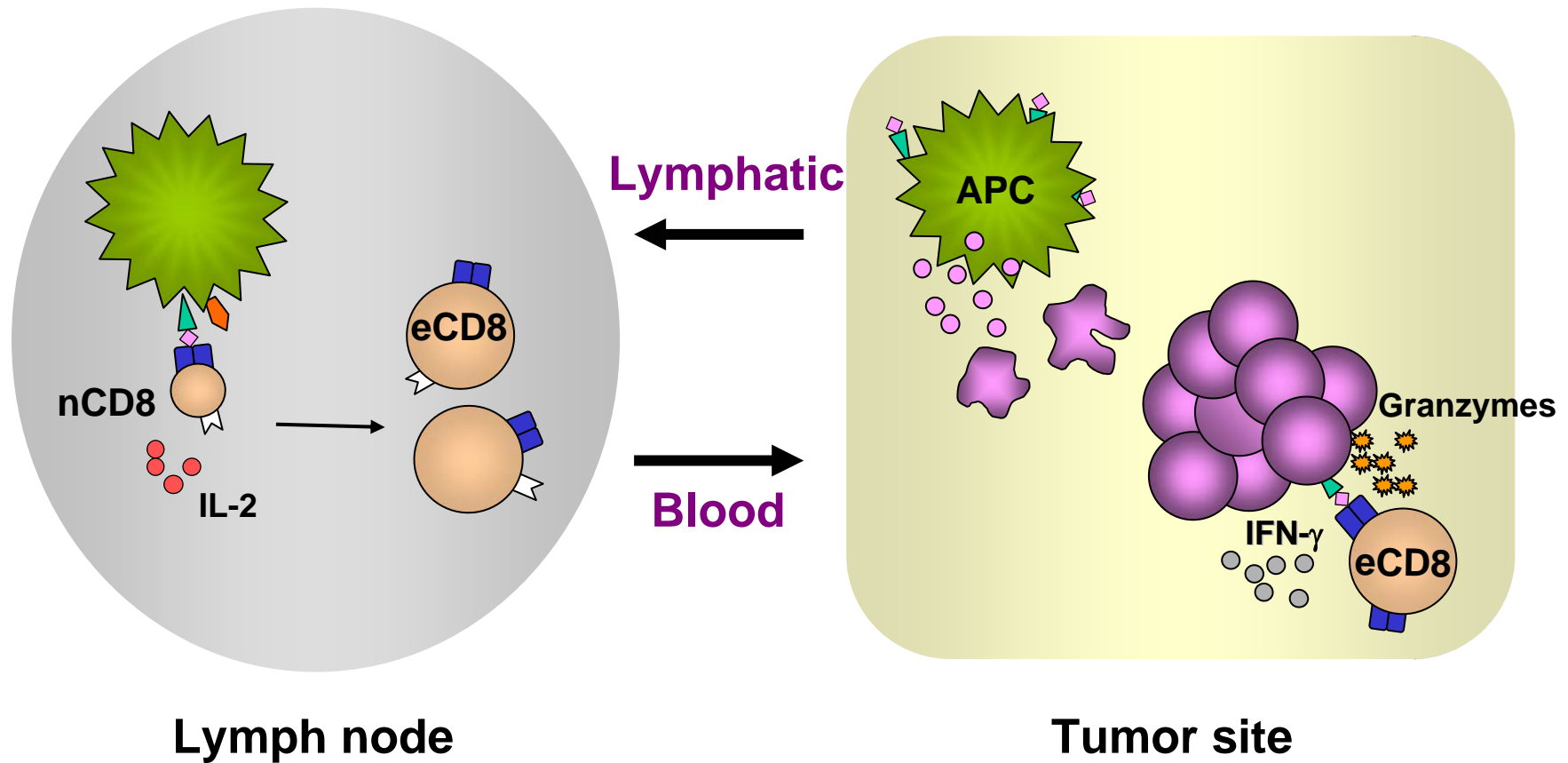


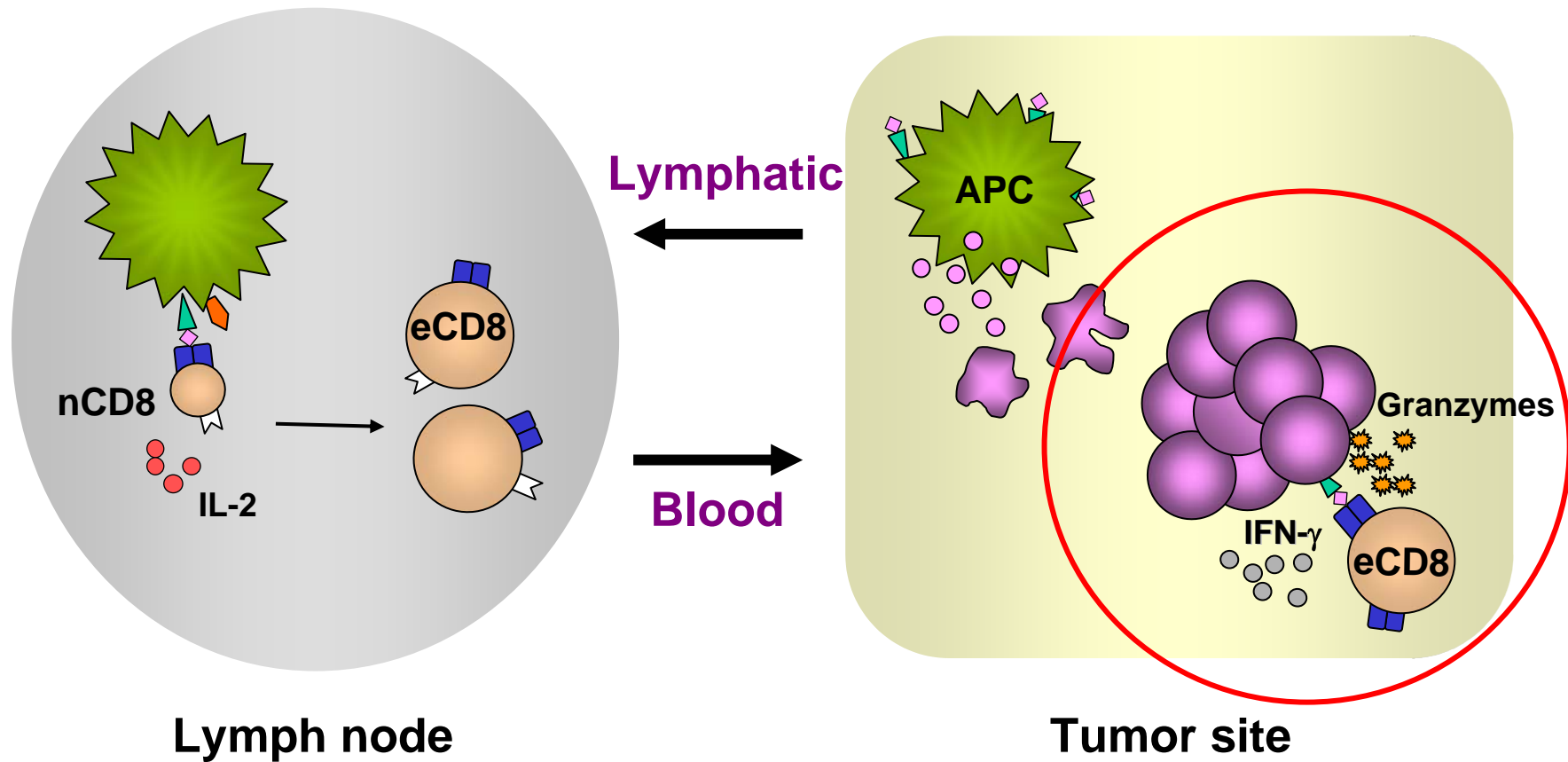
Overcoming immune suppression/tolerance in cancer patients

**Thomas F. Gajewski and
Elizabeth M. Jaffey**

Tumor escape from immune response: *priming phase or effector phase?*

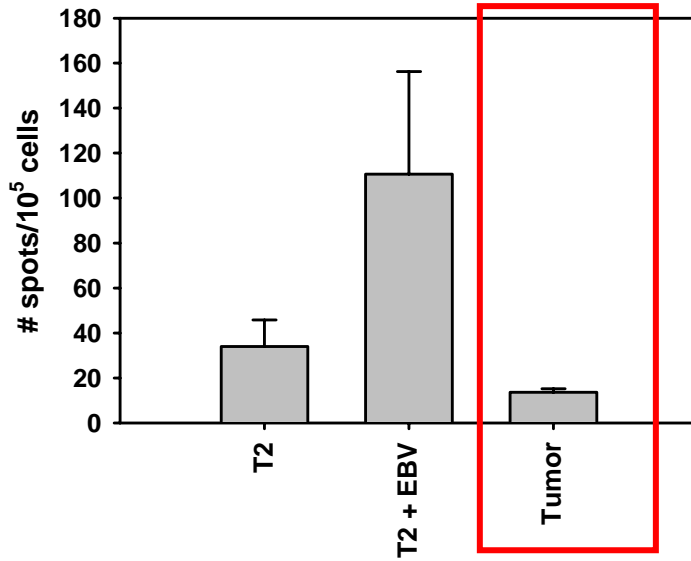


New focus on downstream defects in effector phase of immune response in tumor microenvironment

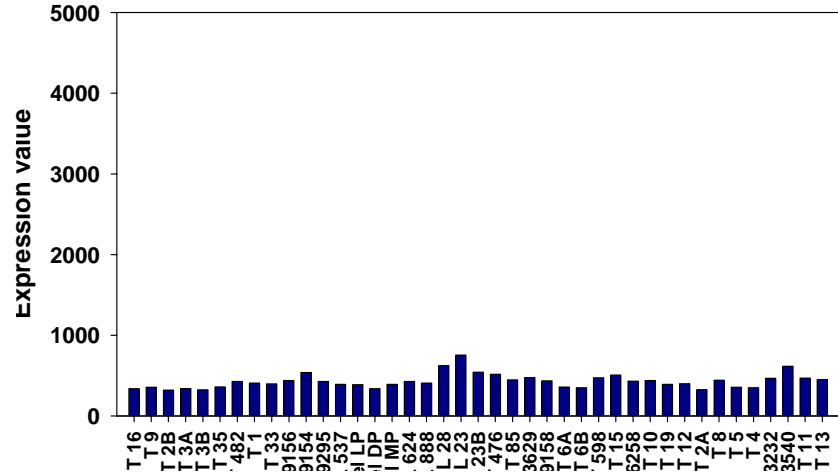


Complexity of suppressive mechanisms in melanoma microenvironment

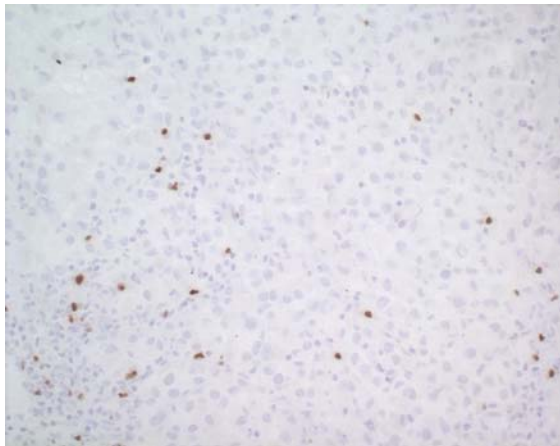
Ex vivo TIL dysfunction



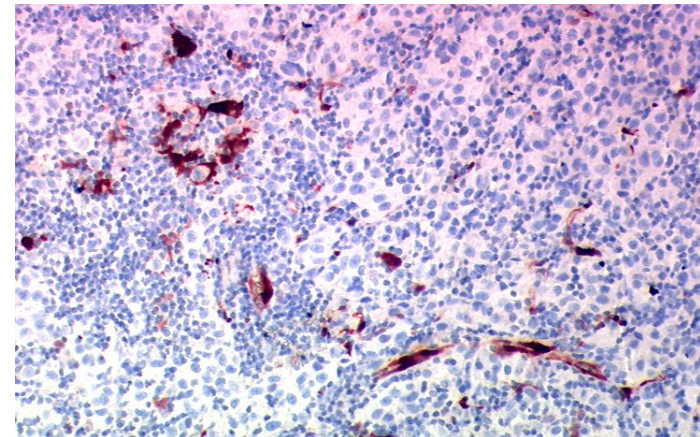
Absence of B7 costimulation



Presence of FoxP3



Expression of IDO



Uncoupling negative regulation to improve immune-mediated tumor rejection

- Homeostatic proliferation
 - Maintains T cell function and reverses anergy
- Stroma destruction
 - Eliminates support structure
 - Perhaps eliminates myeloid suppressor cells
- IDO inhibition
- Regulatory cell depletion