SIRT1 deacetylates RORyt and enhances Th17 cell generation

Hyung W. Lim, Seung Goo Kang, Jae Kyu Ryu, Birgit Schilling, Mingjian Fei, Intelly S. Lee, Amanuel Kehasse, Kotaro Shirakawa, Masaru Yokoyama, Martina Schnölzer, Herbert G. Kasler, Hye-Sook Kwon, Bradford W. Gibson, Hironori Sato, Katerina Akassoglou, Changchun Xiao, Dan R. Littman, Melanie Ott, and Eric Verdin

Vol. 212, No. 5, May 4, 2015. Pages 607-617.

The Journal of Experimental Medicine

The authors regret that the labels "Input" and "IP: α -Flag" were switched in the original publication of Fig. 2 (E and F). This has now been corrected in the HTML and PDF versions of the paper. The corrected image also appears below.

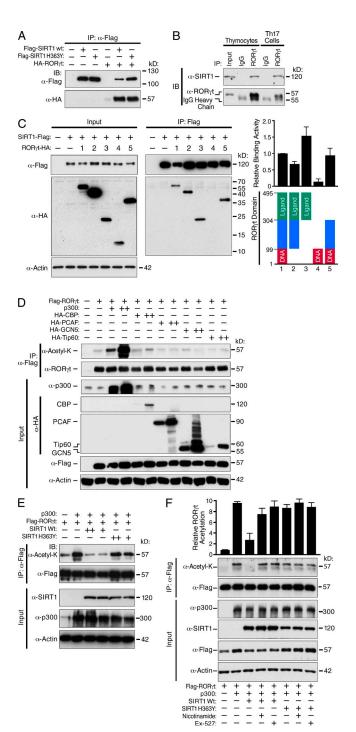


Figure 2. SIRT1 interacts with RORγt. (A) Flag-tagged WT or H363Y mutant SIRT1 was immunoprecipitated from transfected 293T cells and probed as indicated. (B) RORyt was immunoprecipitated from thymocytes and Th17 cells, and probed with antibody against SIRT1. (C) Immunoprecipitation using lysates of 293T cells co-transfected with constructs encoding SIRT1 and various deletion mutants of RORyt. Relative binding was calculated by normalizing the ratio of immunoprecipitated RORyt/SIRT1 to the ratio of input RORyt/SIRT1. (D) Acetylation of Flag-tagged RORyt immunoprecipitated from 293T cells transfected with various acetyltransferases and Flag-ROR vt. (E and F) Acetylation of Flag-RORyt co-transfected with p300 and WT or H363Y mutant SIRT1, in the absence (E) or in the presence (F) of nicotinamide and Ex-527. Equal amounts of Flag-RORyt were loaded (D-F). Representative data are shown from four (A), three (B and E), and two (D) independent experiments, and combined data are shown from three (C and F) independent experiments with error bars representing ±SEM.