

The role of ubiquitinase in B cell development and function

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Ubiquitinases are a select group of enzymes that modify target proteins through ubiquitination, which plays a crucial role in the regulation of protein degradation, location, and function. B lymphocytes that originated from bone marrow hematopoietic stem cells (HSC), exert humoral immune functions by differentiating into plasma cells and producing antibodies. Previous studies have shown that ubiquitination is involved in the regulation of the cell cycle and signal transduction important for B lymphocyte development and function. In this review, how ubiquitinases regulate B cell development, activation, apoptosis, and proliferation is discussed, which could help in understanding the physiological processes and diseases related to B cells and also provides potential new targets for further studies. ©2020 Society for Leukocyte Biology

B cell

NF- κ B

ubiquitination