

Acute lymphoblastic leukemia relapse after CD19 - targeted chimeric antigen receptor T cell therapyJiasheng Wang, ... [See all authors](#) >

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Abstract

CART19 therapy has revolutionized the treatment of CD19⁺ acute lymphoblastic leukemia, demonstrating an unprecedented complete remission rate; however, as follow - up prolongs, a high relapse rate after CART19 therapy has emerged as one of the major problems. Relapse can be attributed to the loss of leukemic cell immunogenicity, diminished function and amount of CART19 cells, and the inhibitory bone marrow microenvironment. Although studies to prevent and treat relapse have begun, some encouraging results have demonstrated the possibility of decreasing the relapse rate. In this review, we focus on the possible mechanisms behind relapse. We will summarize and propose strategies to prevent and manage relapse on the basis of these potential mechanisms.