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# Anti-minor Histocompatibility Complex Donor T-Lymphocytes

National Cancer Institute

## Source

National Cancer Institute. *Anti-minor Histocompatibility Complex Donor T-Lymphocytes*. NCI Thesaurus. Code C148500.

A preparation of allogeneic, donor-derived T-lymphocytes that are specific for a unique set of minor histocompatibility complex antigens (MiHA) exclusively found on the surface of malignant cells, with potential immunomodulating and antineoplastic activities. T-lymphocytes are derived from an allogeneic hematopoietic cell transplant (AHCT) donor. Ex vivo, these T-cells are exposed to and primed against a select set of host-specific hematopoietic tissue-restricted MiHAs that are expressed on leukemic cells. Then the cells are subsequently expanded. After AHCT and infusion of the anti-MiHA T-lymphocytes, these cells target and bind to MiHA antigens expressed on the host's leukemia cells, thereby killing these cancer cells. MiHA are small, cell-surface peptides that are associated with graft-versus-host disease (GvHD). The selected set of MiHAs is expressed mainly, or only, by hematopoietic cells, and overexpressed on leukemic cells.