In 2020, Cures Within Reach funded Dr. Alix Seif at the Children’s Hospital of Philadelphia (CHOP) to support a single-site pilot phase 1 feasibility study using measurable residual disease (MRD) to identify pediatric acute lymphoblastic leukemia (ALL) patients with a higher risk of relapse following bone marrow transplant, and then matching these patients to personalized repurposed immune treatments. Now a multi-site trial, Dr. Seif and colleagues are using daratumumab, a multiple myeloma drug, to prevent post-transplant relapse of T-cell ALL (T-ALL) in children with positive MRD. This trial hopes to prevent disease recurrence in T-ALL patients who are at a high risk of relapse.

Dr. Seif is a pediatric oncologist with an interest in hematopoietic stem cell transplantation (HSCT). She holds leadership positions at the Pediatric Transplantation and Cellular Therapy Consortium and is the Associate Director of Clinical Research at the Center for Childhood Cancer Research at CHOP.

Dr. Seif’s interest in immunotherapy was sparked during her first year of her oncology fellowship. Her first patient was a baby with relapsed acute myeloid leukemia, who developed then survived a severe infection that caused his leukemia to go into remission. Since then, she has been a dedicated leader in pediatric oncology research: “Seeing young children fighting cancer but still living their lives every day is my inspiration.” Her mission: to deliver an accurate prediction of relapse risk, as well as safe and effective treatment options for patients with hematologic malignancies.

PROFILES

- Dr. Alix Seif is a pediatric oncologist and an Associate Professor at the Perelman School of Medicine in Pennsylvania
- Dr. Seif leads the Leukemia-HSCT subgroup at CHOP

CWR FUNDING

- What started as a single-site $50,000 pilot trial at CHOP is now a multi-site phase 1 study. CHOP received more than $900,000 in additional funding for this trial testing the feasibility and safety of using daratumumab to prevent relapse in children with T-ALL after HSCT.
- Dr. Seif and this trial represent four of Cures Within Reach’s communities:
  - Oncology
  - Pediatrics
  - Rare Diseases
  - Diversity, Equity & Inclusion