

Better matching leads to better outcomes
– comparing 9/10 MMUD to haploidentical transplants
A study from the Acute Leukemia Working Party of the EBMT

WHAT?

Comparison of outcomes of hematopoietic cell transplant (HCT) with post-transplant cyclophosphamide (PTCy) between those with a 9/10 mismatched unrelated donor (MMUD) and a haploidentical (half-matched) donor for patients with acute myeloid leukemia (AML) in complete remission

WHY?

Using mismatched and haploidentical donors provides more patients with access to HCT

In the age of HCT with PTCy, it’s important to compare outcomes using both donor types to make informed decisions for patients when both donor options are available

WHEN?

January 2009 – September 2019

WHERE?



Transplants reported to European Society for Blood and Marrow Transplantation (EBMT)

WHO?

1,751 adults receiving HCT to treat AML in complete remission

- 155 had 9/10 MMUD with peripheral blood graft (MMUD-PB)
- 1,596 had haploidentical donor
 - 647 had bone marrow graft (Haplo-BM)
 - 949 had peripheral blood graft (Haplo-PB)

RESULTS

Median time from diagnosis to HCT was 6 months in all 3 groups

9/10 MMUD-PB was associated with better 2-year overall survival, non-relapse mortality and leukemia-free survival compared to haplo-BM and haplo-PB

IMPACT

- Better matching leads to better outcomes. This data suggests impact of HLA matching may fall along a continuum.
- Prioritization of less mismatched unrelated donors may be preferable to haploidentical donor.
- HCT using haploidentical donor did not get patients to transplant more quickly— all 3 groups had the same 6-month median time to transplant.

