

Raccolta dati retrospettiva

Leucemie mieloidi acute e mielodiplasie secondarie a trattamento pediatric like per leucemia linfoblastica e linfo-malinfoblastico

Second malignant neoplasms after treatment of childhood acute lymphoblastic leukemia. Schmiegelow et al. J Clin Oncol. 2013 Jul 1;31(19):2469-76

- **Second malignant neoplasms (SMNs) after diagnosis of childhood acute lymphoblastic leukemia (ALL) are rare events.**
- **642 children with SMNs occurring after treatment for ALL from 18 collaborative study groups between 1980 and 2007.**
- **Acute myeloid leukemia (AML; n = 186)**
- **Myelodysplastic syndrome (MDS; n = 69), and nonmeningioma brain tumor (n = 116) were the most common types of SMNs and had the poorest outcome (5-year survival rate, 18.1% ± 2.9%, 31.1% ± 6.2%, and 18.3% ± 3.8%, respectively).**
- **Five-year survival estimates for AML were 11.2% ± 2.9% for 125 patients diagnosed before 2000 and 34.1% ± 6.3% for 61 patients diagnosed after 2000 (P < .001)**
- **5-year survival estimates for MDS were 17.1% ± 6.4% (n = 36) and 48.2% ± 10.6% (n = 33; P = .005).**
- **Allogeneic stem-cell transplantation failed to improve outcome of secondary myeloid malignancies**
- **Myeloid malignancies with monosomy 7/5q- were associated with high hyperdiploid ALL karyotypes, whereas 11q23/MLL-rearranged AML or MDS was associated with ALL harboring translocations of t(9;22), t(4;11), t(1;19), and t(12;21) (P = .03).**

Therapy-related acute myelogenous leukemia and myelodysplastic syndrome in patients with acute lymphoblastic leukemia treated with the hyperfractionated cyclophosphamide, vincristine, doxorubicin, and dexamethasone regimens.

Verma D1, O'Brien S, Thomas D, Faderl S, Koller C, Pierce S, Kebriaei P, Garcia-Manero G, Cortes J, Kantarjian H, Ravandi F.

Cancer. 2009 Jan 1;115(1):101-6

- 641 patients with de novo ALL treated with the hyper-CVAD
- Sixteen patients (2.49%) secondary acute myelogenous leukemia (AML) (6 patients) or myelodysplastic syndrome (MDS) (10 patients).
- At the time of ALL diagnosis, the median age was 53 years
- Karyotype at time of AML/MDS diagnosis was -5, -7 in 9 patients, normal in 1 patient, complex in 1 patient, inv(11) in 1 patient, t(4;11) in 1 patient, del(20) in 1 patient, and unavailable in 2 patients.
- Secondary AML/MDS developed at a median of 32 months after ALL diagnosis.
- Cytarabine plus anthracycline-based treatment was given to 12 patients with AML and high-risk MDS
- One patient with MDS received arsenic trioxide, 1 received clofarabine, and 2 received decitabine.
- Response to treatment was complete remission in 3 patients, partial remission in 6 patients, and no response in 6 patients
- Eight patients (1 with AML and 7 with MDS) allogeneic stem cell transplantation, 6 died at a median of 3 months (range, 0.5-11 months) after transplantation.
- The median overall survival after a diagnosis of secondary AML and MDS was 9.25 months (range, 1+ to 26+ months).
- CONCLUSIONS:
- Secondary AML and MDS occur infrequently in adult patients with de novo ALL treated with the hyper-CVAD regimens, and response to therapy is poor.

Obiettivi dello studio

- **Incidenza LMA/MDS secondarie in pazienti adulti affetti da LLA trattati con chemioterapia pediatric like, in protocollo o fuori protocollo dal 2008**
- **Caratterizzazione diagnostica**
- **Descrivere il trattamento (CHT, trapianto)**
- **Descrivere l'outcome (OS, DFS)**

DATA BASE

- **Età/Sesso**
- **DATA diagnosi LLA/DATA diagnosi neoplasia therapy-related (NM-TR)**
- **Schema CT LLA/Trapianto allogenico per LLA/Radioterapia per LLA**
- **Tipo di NM-TR**
- **Citogenetica NM-TR**
- **SE MDS: IPSS**
- **SE LMA: classe ELN**
- **biologia molecolare**
- **Data e Tipo di terapia I linea**
- **Risposta I linea**
- **Trapianto allogenico/Tipo trapianto/Tipo condizionamento**
- **OS/DFS**

Dati preliminari

- 14 centri
- 4/393 (1%)
- Tempo tra diagnosi LLA e LMA/MDS sec: mediana 38,5 mesi
- Età: mediana 61,7
- 3 MDS: HMA
 - INT-2
 - 3 del 7
 - 2 del 5
 - 2 complex
- 1 LMA: FLA-ida, Allo tx MUD, DLI su recidiva
 - high risk
 - 75 chr, minutes
- OS 50%; FU mediano 7,5 mesi