

The prognostic significance of early treatment response in pediatric relapsed acute myeloid leukemia: results of the international study Relapsed AML 2001/01

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Supplementary information

Supplemental Methods

Early treatment response was evaluated on the basis of the bone marrow (BM) blast percentage among nucleated cells determined by microscopic evaluation of conventionally stained smear preparations. These were obtained on day 15 of first reinduction and before starting the second reinduction course, which was scheduled on day 28. If the second chemotherapy course had to be postponed, because of prolonged aplasia or severe infection, BM was obtained as soon as possible thereafter (between day 28 and day 42 from start of the 1st course), and the date of that evaluation was still classified as day 28. As the day 28 BM blast count was the primary endpoint also for the randomized trial question, more data were available for day 28 (n = 496) than for BM blasts on day 15 (n = 370). Thus, day 28 data were only lacking in 50 patients of the total cohort (due to early death before day 28 in 11 patients). Day 15 data might allow even earlier treatment adaptations and therefore were investigated as well in comparison to the day 28 results.

Supplementary Table S1: Patient characteristics of the cohort with missing data on day 15 or day 28 (N=208) and in the core group of patients with data both on day 15 and day 28 (N=338)

	Core Group				
	Day 15 and 28 data available				p-value
	No		Yes		
N	%	N	%		
Number of patients	208		338		
Age at relapse (years) median	6.9		10.2		<0.001
Leukocytes at relapse* (x10 ³ /μl) median	3,100		3,710		0.86
(Q1-Q3)	2,000-12,000		2,180-8,000		
Time to relapse (years) median	.75		1.01		<0.001
(Q1-Q3)	0.5-1.2		0.7-1.5		
Gender: Male	128	62	191	57	0.25
FAB types*					
M1/M2 Auer, M4eo	34	21	105	33	0.01
Other	125	79	211	67	
Cytogenetic data*					
t(8;21), inv(16)	21	13	70	23	0.01
other	144	87	240	77	
Site of relapse*					
BM isolated	149	86	285	87	0.88
BM combined	24	14	44	13	
Early/late relapse					
Relapse < 1 year from diagnosis	104	50	146	43	<0.001
Relapse ≥ 1 year from diagnosis	71	34	170	50	
Nonresponder	33	16	22	7	

*Data were not available in all patients