Targeting cytokine-induced leukemic stem cell persistence in chronic myeloid leukemia by IKK2-inhibition

Marlena Bütow,^{1,2} Fabio J. Testaquadra,^{1,2} Julian Baumeister,^{1,2} Tiago Maié,³ Nicolas Chatain,^{1,2} Timo Jaquet,^{1,2} Stefan Tillmann,^{1,2} Martina Crysandt,^{1,2} Ivan G. Costa,³ Tim H. Brümmendorf^{1,2} and Mirle Schemionek^{1,2}

¹Department of Hematology, Oncology, Hemostaseology, and Stem Cell Transplantation, Faculty of Medicine, RWTH Aachen University; ²Center for Integrated Oncology Aachen Bonn Cologne Düsseldorf (CIO ABCD) and ³Institute for Computational Genomics, Joint Research Center for Computational Biomedicine, RWTH Aachen University, Aachen, Germany

Correspondence: M. SCHEMIONEK-REINDERS - mschemionek@ukaachen.de

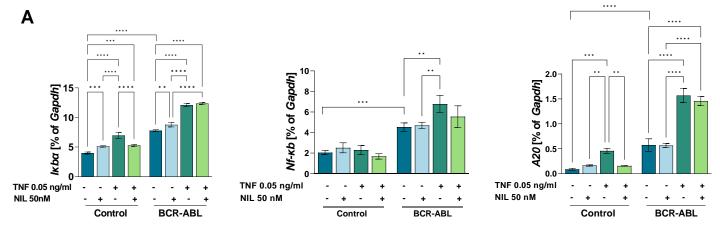
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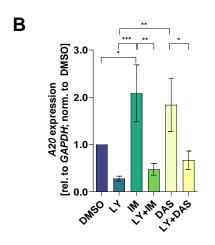
Supplementary Appendix

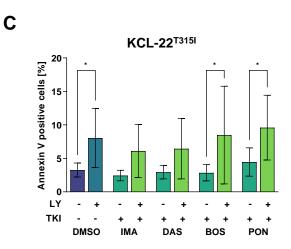
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¹Department of Hematology, Oncology, Hemostaseology, and Stem Cell Transplantation, Faculty of Medicine, RWTH Aachen University, Aachen, Germany, ²Center for Integrated Oncology Aachen Bonn Cologne Düsseldorf (CIO ABCD), Aachen, Germany, ³Institute for Computational Genomics, Joint Research Center for Computational Biomedicine, RWTH Aachen University, Aachen, Germany

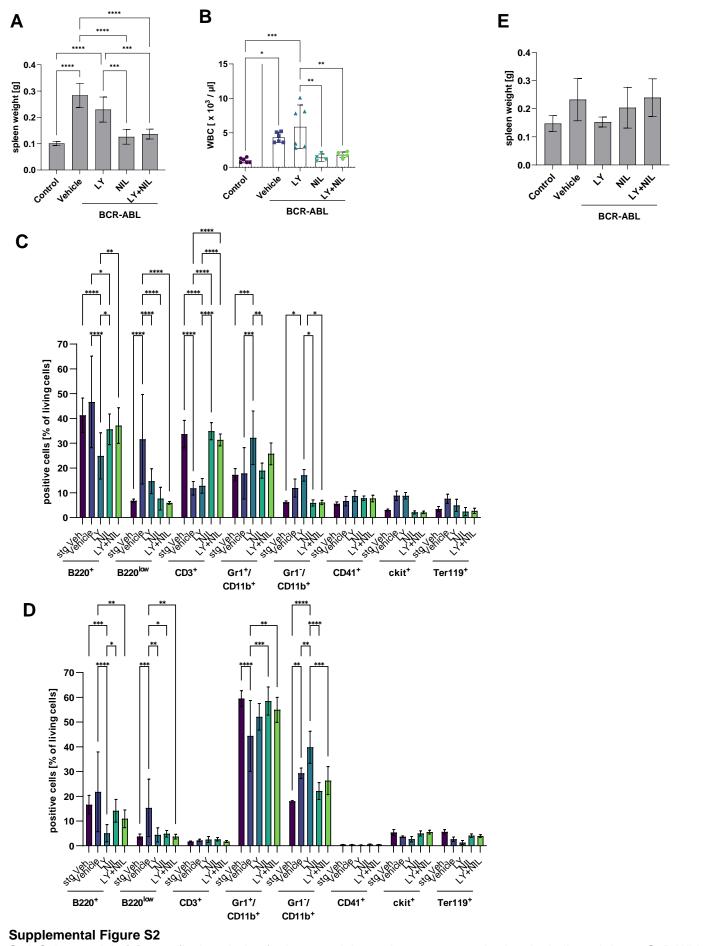




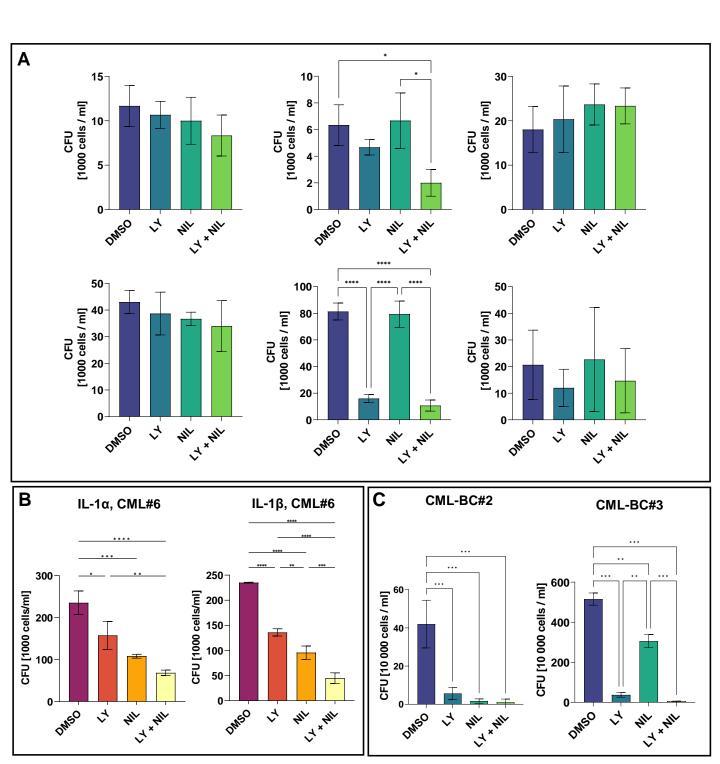


Supplemental Figure S1

S1A Expression of IκBα, NF-κB, and A20-mRNA in BCR-ABL-negative control- and BCR-ABL-positive murine myeloid progenitor 32Dcl3 cells is shown as % of Gapdh. Cells were treated using 0.05 ng/ml TNF and/or 50 nM NIL for 30 min. One representative of n=3 is shown. **S1B** Human CML KCL-22 cells were treated using LY (10 μM), IM (1 μM), DAS (10 nM) or LY+IM, and LY+DAS, in the presence of 1 ng/ml TNF for 16h. Expression of NF-κB-target gene A20 was analyzed via qRT-PCR. Shown are mean values of n=3, normalized to DMSO control. **S1C** Flow cytometry analyses of AnnexinV-positive KCL- 22^{T315l} cells upon 48h of treatment using LY (5 μM), IM (1 μM), LY+IM, DAS (10 nM), LY+DAS, BOS (5 nM), LY+BOS, PON (5 nM), LY+PON in the presence of TNF (1 ng/ml; n=3). Mean \pm SD, significances were calculated using one-way ANOVA. *p<0.05, **p<0.01, ***p<0.001



S1A Spleen weight [g] upon final analysis of primary recipients, that were treated using the indicated drugs. **S1B** White blood cell count (WBC) upon final analysis. **S1C** FACS-positive cells in spleen and BM **(S1D)**, shown as % of living cells for B-cells (B220⁺), immature B-cells (B220⁻), T-cells (CD3⁺), granulocytes (Gr1⁺/CD11b⁺), immature granulocytes (Gr1⁻/CD11b⁺), megakaryocytes (CD41⁺), ckit⁺-positive cells, and erythrocytes (Ter119⁺). **S1E** Spleen weight [g] upon final analysis of secondary recipients. Mean ± SD, level of significance was calculated using one-way ANOVA. *p<0.05, **p<0.01, ***p<0.001, ****p<0.0001



Supplemental Figure S3

S3A Healthy donor CD34+ cells were isolated from femoral heads and were treated for 72 h using LY (10 μM), NIL (50 nM), LY+NIL, or DMSO control, in the presence of 1 ng/ml TNF. Subsequently, cells were seeded in methylcellulose and colonies were counted on day 10. **S3B** CFU-assays using CML-CP patient derived BM CD34+ cells after treatment using LY (10 μM), NIL (50 nM), LY+NIL, or DMSO control, in the presence of IL-1α (2.5 ng/ml, left panel) or IL-1β (3.5 ng/ml, right panel) for 72 h. One patient is presented as an example out of n=3. **S3C** CFU-assays of BC patient derived mononucleated BM being treated for 72 h using LY (10 μM), NIL (50 nM), LY+NIL, or DMSO control, in the presence of TNF (1 ng/ml). Mean \pm SD, level of significance was calculated using one-way ANOVA. *p<0.05, **p<0.01, ****p<0.001