

Abstract Submission No.: A-0217

Severe acute kidney injury associated with transformation of chronic myelomonocytic leukemia to acute myeloid leukemia: A case report

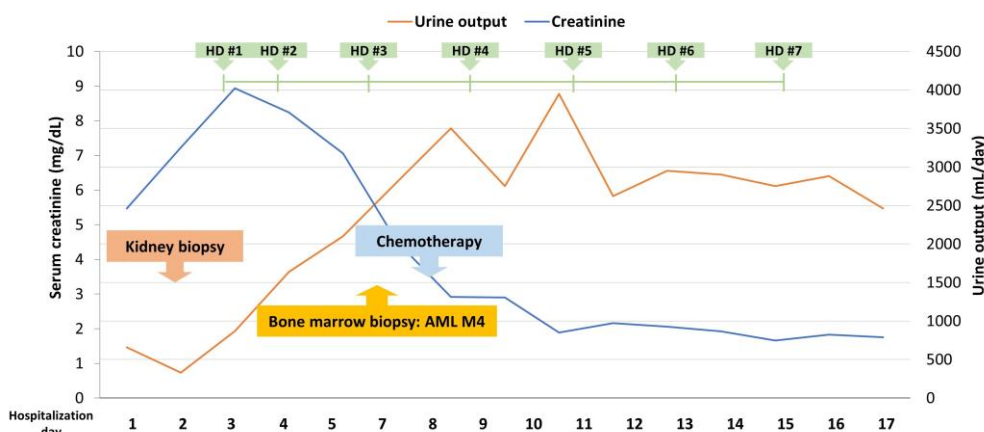
Seong-Wook Lee¹, Hee-Yeon Jung¹, Ji-Young Choi¹, Jang-Hee Cho¹, Sun-Hee Park¹, Chan-Duck Kim¹, Yong-Lim Kim¹, Jeong-Hoon Lim¹, Yong-Jin Kim²

¹Department of Internal Medicine-Nephrology, Kyungpook National University Hospital, Korea, Republic of

²Department of Pathology, Kyungpook National University Hospital, Korea, Republic of

Case Study : Chronic myelomonocytic leukemia (CMML) is a rare hematologic disorder that infrequently causes acute kidney injury (AKI). CMML can transform to acute myeloid leukemia (AML), which can be accompanied by the deterioration of kidney function. However, severe AKI due to extramedullary manifestations of AML is rare. Herein, we present the case of a 67-year-old man with CMML patient who experienced transformation to AML with severe AKI necessitating hemodialysis; the cause was AML transformation. The patient with stable kidney function on chemotherapy for CMML presented with sudden decline in kidney function. Hemodialysis was initiated because of severe AKI, and histopathologic evaluation of the kidney biopsy specimen revealed severe, diffuse mixed inflammatory cell infiltrates in the interstitium and c-kit-immunopositive myeloblast-like cells. Bone marrow biopsy performed because of the kidney biopsy findings suggesting leukemic infiltration led to the diagnosis of AML. The patient received chemotherapy for AML and his kidney function recovered. As illustrated in this case, severe AKI can develop as an early extramedullary manifestation during transformation from CMML to AML. Therefore, in patients with CMML and rapidly declining renal function, transformation to AML should be considered and histopathologically confirmed by kidney biopsy.

Revised Figure 1_240112.jpg



Revised Figure 1_240112.jpg

