A case of floral variant of follicular lymphoma

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We experienced rare case of floral variant of follicular lymphoma. Floral variant of follicular lymphoma is uncommon and it shows floral appearance caused by atypical lymphocytes that irregularly invade and invaginate the germinal center. Floral variant of follicular lymphoma was divided two histological subtypes: (1) A macrogerminal center pattern where the mantle zone lymphocytes were invaginated into the neoplastic germinal center, often reminiscent of a floral design. (2) A microgerminal center pattern where the massive invasion of mantle zone lymphocytes resulted in almost complete breakage of the neoplastic follicles.

This patient’s tumor was incidentally found at a peribronchial lymph node of a 59 year old man by chest PA, PET (Positron Emission Tomography) and CT (Computed Tomography). It had been hard to biopsy so the patient received lobectomy of the left lower lung. The feature was similar to lymphoepitheloma-like carcinoma or metastatic carcinoma in lymph nodes. Microscopic analysis revealed irregular shaped germinal center-like lesion, which look like progressive transformation of germinal center. Immunohistochemical analysis showed that CD20, bcl-6, and CD10 positive but do not express CD3, CD5 and bcl-2.

We treated this patient with CHOP chemotherapy regimen. Follow up abdominal CT scan after treatment revealed complete resolution of tumor mass.

We report a case of floral variant of follicular lymphoma after treatment of treatment with CHOP chemotherapy regimen and review the literature.

Efficacy of CODOX-M/IVAC in patients with adult Burkitt’s lymphoma (BL)

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Background: CODOX-M/IVAC regimen (cyclophosphamide, vincristine, doxorubicin, and methotrexate/ifosfamide, etoposide and cytarabine) is originally developed for pediatric BL. When used in adult BL, it resulted in 2-year overall survival (OS) of 72.8%. This study was undertaken to evaluate the efficacy and toxicity of CODOX-M/IVAC in adult BL. Methods: Thirty-three BL patients treated with CODOX-M/IVAC between January 1996 and September 2008 were analyzed for overall response rate (ORR), OS, event-free survival (EFS) and toxicity. Low-risk (n=3) and high-risk (n=30) patients received 3 cycles of CODOX-M and 4 cycles of alternating CODOX-M/IVAC. Results: After a median follow-up of 12.7months(range 0.7~75.6months), 2-year OSs were 100% and 49% and 2-year EFS were 100% and 42% for low-risk and high-risk groups, respectively. ORRs were 100% for low-risk group and 56.6% for high-risk group. Median OS and EFS in high risk group were 9.1 and 7.2 months. EFS and OS were significantly inferior in patients who received delayed schedule of CODOX-M/IVAC (P=.026 and P=.010) and those who failed to complete CODOX-M/IVAC (P =.001 and P=.003). Nineteen patients (63.3%) of high-risk patients completed planned schedule. Eleven patients (36.7%) of high-risk patients was not able to complete planned schedule due to the toxicity. Grade 3 or 4 neutropenia was observed in 92.9~100% in each cycle. Grade 3 or 4 non-hematologic adverse events included CNS toxicity (3 cases), renal toxicity requiring renal replacement therapy (4 cases), hepatic toxicity (3 cases) and severe mucositis (3 cases). Two treatment related mortality cases were due to uncontrolled infection. Conclusions: CODOX-M/IVAC is an effective regimen for adult BL patients. However, considering high rates of toxicity and incomplete schedule, dose-modified CODOX-M/IVAC is necessary for Korean patients with adult BL.

Keywords Burkitt’s lymphoma, CODOX-M/IVAC