## Presenting Author: Emilio Berti, MD; Abstract #19

## **CUTANEOUS T-CELL LYMPHOMAS CD8+**

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Recently the expression of cytotoxic CD8+ immunophenotype in several cutaneous T-cell lymphomas entities was identified. Around 5% of mycosis fungoides (MF) may express a CD8+,CD45RA+, TIA-1+, CD5- (intraepitelial-pagetoid variant) or a CD8+, CD45RO+, CD5+, TIA-1+ (dermal, band-like lichenoid variant) immunophenotype and usually present large erythemato-squamous, hycthyosiform plaques in the gluteal area or arms, showing a very indolent course as classical MF. Annular or erythemato-squamous psoriasiform lesions in the abdominal area or arms, with an hypochromic evolution and an indolent course, was characteristic of MF in children and adolescent. In the group of CD30+ lymphoproliferative disorders CD8+ lymphomatoid papulosis cases were associated with a PLEVA type clinical presentation, with papulo-necrotic or papulo-haemorragic blistering skin lesions and strong epidermotropism. Cases of CD30+, CD8+ cutaneous anaplastic large cell lymphoma were also observed with frequent systemic involvement and fatal outcome in 50% of our cases. Subcutaneous panniculitis-like T-cell lymphoma in the classical cytotoxic (CD45RO+, TIA-1+) alphabeta (BF-1+) variant showed an intermediate prognosis characterized by cutaneous relapses and possible haemophagocytic syndrome. Aggressive epidermotropic cytotoxic CD8+ T-cell lymphoma (AeCxCD8+L) showed multiple hyperkeratotic or ulcerated nodules and plagues, with a typical CD8+, TIA-1+, CD45RA+, CD5-/+, CD2+/- phenotype and a very aggressive fatal course. Cases of pleomorphic small-medium or medium-large lymphoma with an aggressive course (4 cases) or with a benign evolutions may be also CD8+, interestingly three of these aggressive cases were CD8- at presentation and positive in subsequent biopsies. Finally, very rare cases of NK/T nasal type extranodal lymphomas or cases of hydroa vacciniforme-like T cell lymphoma showing a very aggressive course may express CD8+, but in association with EBV strong positivity. Cytomorphology, immunohistochemistry and genomics must be used for the diagnosis and in the future they should be useful to better classify CD8+ CTCLs variants.