

eP080

ePoster Viewing

Lyme borreliosis

## **COURSE AND OUTCOME OF SOLITARY ERYTHEMA MIGRANS IN PATIENTS TREATED FOR BREAST CANCER**

V. Maraspin<sup>1</sup>, J. Cimperman<sup>1</sup>, E. Ružic-Sabljić<sup>2</sup>, F. Strle<sup>1</sup>

<sup>1</sup>Department of Infectious Diseases, University Medical Centre Ljubljana, Ljubljana, Slovenia ; <sup>2</sup>Institute of Microbiology and Immunology, Medical Faculty, Ljubljana, Slovenia

**Objectives:** To evaluate the course and outcome of erythema migrans (EM) in breast cancer patients who were immunocompromised due to aggressive treatment.

**Methods:** Information was obtained from a database of over 7000 EM patient examined between 1997 and 2011 at the Department of Infectious Diseases, University Medical Center Ljubljana, Slovenia. The data were acquired prospectively using a structured questionnaire. EM was defined according to modified CDC criteria. During a 15-year period, seven patients, aged 45–70 years, developed a typical solitary EM during treatment with tamoxifen, trastuzumab and/or anastrozole for breast cancer. Their pre-treatment characteristics and outcome after treatment were compared at first visit and at 2, 6, and 12 months follow up with 21 immunocompetent, age-, sex- and antibiotic treatment- matched subjects who were diagnosed with EM during the same year.

**Results:** Comparison between the two groups revealed analogous findings for the frequency of tick bite, incubation, duration and diameter of EM prior to diagnosis, presence of systemic symptoms, seropositivity, and *Borrelia* skin and blood culture results. In addition, the duration of EM after the beginning of antibiotic treatment and the course and outcome during 12 months follow up were comparable in both groups. Of the 28 subjects in both patient groups, 27 had complete response to antibiotic treatment for EM. In one patient with breast cancer, *B. burgdorferi* sensu lato was found by culture in skin biopsy specimen two months after antibiotic therapy and this patient was subsequently treated successfully with additional two weeks of oral antibiotics.

**Conclusion:** Thus, with the exception of one patient, the course and clinical outcome of early Lyme borreliosis were comparable in patients who were immunocompromised due to breast cancer treatment and in the immunocompetent EM patients.