

**P2236 Epidemiology, species distribution and outcome of candidaemia in a tertiary care university hospital in Italy: a single-centre retrospective study**

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**Background:** Candidemia is an important bloodstream infection with high rates of mortality. We evaluated the epidemiology, species distribution and outcome of candidemia in a single center in Italy from 2010 to 2017.

**Materials/methods:** A single center retrospective cohort study was performed to examine the prevalence of candidemia in all patients admitted at a tertiary care teaching hospital (ASST Sette Laghi, Varese) in Northern Italy.

**Results:** From January 2010 to December 2017, a total 276 episodes of candidemia were identified from 268 patients (155 M, 113 F, mean age 67.7 yrs [0.7-94.2]). The overall incidence of candidemia was 0.9 cases per 1,000 admissions. *Candida albicans* (58.7%) was the most common species followed by *C. parapsilosis* (19.6%) and *C. glabrata* (13%). The majority of the candidemia episodes were found in internal medicine department (54%), with significant increase in incidence during the period considered (33.3% in 2010 vs 62.5% in 2017,  $p=0.013$ ), followed by the surgical ward (23.2%) and the intensive care units (17.8%). The most frequent clinical characteristics of the patients were hospitalization for  $\geq 10$  days (83.2%), administration of antibiotic therapy in the previous 5 days (73.5%) and presence of  $\geq 2$  comorbidities (68.3%). In addition, in our study the majority of the patients carried a central venous catheter (75.4%) and received total parenteral nutrition in the last 30 days (56.7%). The overall 30-day mortality was 34.6%. Multivariate analysis showed that factors independently associated with 30-day mortality were the absence of infectious diseases consultation ( $p<0.001$ , OR 4.55 [95% IC 2.54-8.1]), *Candida albicans* infection vs other species ( $p=0.006$ , OR 2.09 [95% IC 1.22-3.6]), internal medicine admission ( $p=0.006$ , OR 2.0 [95% IC 1.22-3.46]) and age  $> 65$  yrs (reference,  $\leq 65$  yrs;  $p=0.002$ , OR 0.44; [95% IC 0.22-0.73]).

**Conclusions:** Our study confirms the increasing prevalence of candidemia in the internal medicine department and the importance of consulting an infectious diseases specialist, in order to start an appropriate therapy as soon as possible. *Candida albicans* remains the most frequent species identified with the highest mortality rate. Moreover, despite the raising awareness about candidemia, the 30-day mortality rate remains high.

