

## **Epidemiological Study of *Candida* Species among Vaginal and Oral Candidiasis from different clinical states.**

**Najwan Abbas Mohammed<sup>1\*</sup>; NematJamel Abdulbaqi<sup>2</sup>; Hamzia Ali Ajah<sup>3</sup>**

<sup>1,2</sup>Department of Biology, College of Science, University of Baghdad, Baghdad, Iraq.

<sup>3</sup>Department of Biology, College of Science, AL-Mustansiriya University, Baghdad, Iraq.

**Abstract:** *Candida albicans* an opportunistic fungus that infects the mucosae of oral and vaginal cavities. The aim of this study was to study the epidemiological distribution of *Candida* species in Iraqi patients with oral and vaginal candidiasis. 104 high vaginal swabs were collected from different infected women (pregnant and non- pregnant) suffered from vulvovaginal candidiasis (VVC) aged between 16- 50 years old during the period from March 2015 to the end of June 2015, 90 oral swabs were collected from children (49 male and 41 female) aged between two days to ten years during the period from May 2015 to the end of June 2015. The laboratory examination results showed that; out of 104 high vaginal swabs (HVS); 49/104 (47.12%) were positive for *Candida* Spp., *Candida albicans* was the most predominant species in percentage 22/49 (45%) and 27(55%) were non *albicans*. out of 90 oral specimens (OS) 47(52.2%) were positive for oral candidiasis and 22/47(47%) were *C. albicans*, whereas 25(53%) were non *albicans*. There are high significant differences of VVC among different age groups with ( $P<0.01$ ), it was predominant at age group 26-35 in percentage 48.98%. VVC was higher among pregnant women in percentage 12/22(54.55%) fallowed by contraceptive users in percentage 21/39 (53.8%) and among contraceptive users; There are high significant differences ( $P<0.01$ ) in the infection among different types of contraceptives. Oral candidiasis (OC) was high frequency ( $P<0.01$ ) in females than males. There are high significant differences ( $P<0.01$ ) in OC according to ages, child feeding and antibiotics usage, babies at age group 1-5 months showed high frequency of OC. Babies with breastfed have less frequency of OC, whereas those with formula fed have the high frequency with OC, in addition to that antibiotics users showed more prevalence of OC.

**Key Word:** Vaginal Candidiasis, Oral Candidiasis, *Candida*, Contraceptives, Breastfed, formula fed.