

Introduction:

Invasive fungal infection is a common problem faced in ICU's of all over the world. If we went back to history, it started in 1835 by the discovery of a mould, *beauveria bassiana* by Agostino Bassi. Then Gruby discovered candidiasis (1842) and Sluyter discovered aspergillosis in 1847^{1,2}. The *Candida albicans* was the most predominant yeast in ICUs, which is recently changing to non *albicans*.³

Aims and Objectives:

Aim of this study is to find out the commonest fungus in northeast part of India and their sensitivity pattern. This will help in decision making while treating invasive fungal infection in this part of the country.

Materials and Methods:

All the positive cultures of respiratory, urine and blood samples were taken. The duration is from June'2017 till March'2018. A total of 86 positive samples were taken. We will continue to collect data's and will come up with larger no in future.

Results:

Drugs	Candida Albicans No=56	Candida Tropicalis No=13	Candida Krusei No=2	Candida Glabrata No=6	Candida Parasilopsis No=1	Candida Kefyr No=1	Trichosporon Asahi No1	Aspergillus Fumigatus No=6
Micafungin	All S	All S	All S	All S	All S	All S	All S	
Flucytosine	All S	All S	All S	All S	All S	All S	All S	
Fluconazole	3 R	All S	2 R	All S	All S	All S	All S	
Voriconazole	All S	All S	All S	All S	All S	All S	All S	
AmphoB	All S	All S	All S	All S	All S	All S	All S	
Caspofungin	All S	All S	All S	1 R	All S	All S	All S	

Discussion and Conclusion:

The commonest fungus found in our study is *Candida Albicans* (65.12%), followed by *Candida Tropicalis* (15.12%), *Candida Glabrata* (6.98%) and *Aspergillus Fumigatus* (6.98%). There is 2 case of *Candida Krusei* (2.33%) and both are resistant to fluconazole. 1 case of *C. Glabrata* is intermediately sensitive to caspofungin. There are 1 case each of *Candida parasilopsis*, *Candida Kefyr* and *Trichosporon Asahi* were found. *Candida tropicalis* is found

to be in second position. The third common position is shared by *Candida Glabrata* and *Aspergillus Fumigatus*. So *Aspergillus Fumigatus* is still an important pathogen in this part of India. Emerging fluconazole resistant in *albicans* and *Krusei* is an important finding as caspofungin decreased sensitivity to *Glabrata*.

We are continuing the study and trying to make it multicentre. We will come up with larger pull of data in future.

References:

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