The pandemic coronavirus disease 2019 (COVID-19) has been the scope for invasive pulmonary aspergillosis (IPA) after the first reports worldwide, now known as CAPA.

**Objectives:** To describe a case series of CAPA documented in four intensive care units while treating patients with severe COVID-19 infections. In the most severe clinical manifestations, patients often die: death rates in the ICU, and death rates in the hospital, and death rates in the world. 

**Methods:** A prospective and descriptive study was performed from March 2020 to February 2022 in four tertiary-level hospitals that treated COVID-19 patients in Mexico. We followed every single culture coming from the COVID-19 ICU. Aspergillus positive cultures had morphological identification, and the MICs were obtained by broth microdilution. We did not intervene in the treatment.

**Results:** During 24 months of follow-up of patients with severe COVID-19 we found 17 adult cases with a maximal identification, from these, 14 patients fit in the possible CAPA definition according to EORTC/MSG, and the remaining 3 were treated according to expert opinion. The baseline characteristics of overall 47% had diabetes, and 41% were obese. Of the 14 cases included in the possible CAPA all of them had acute severe respiratory syndrome (average PaO2/FiO2 154 mEq/l, 64% were prone in position, 76% had intubation at ICU admission, 32% had anticoagulation at ICU. The commonographic pattern predominantly associated were pulmonary infiltrates, nodules and cavitation. Only 2 patients (14%) had a pulmonary galactomannan (≥4) from non-broth-avageous fluid. We had 9 Aspergillus (4 infections and 5 species, 1 A. flavus, 6 patients received voriconazole, 3 patients received natamycin, 1 italnakarin and liposomal amphotericin B were used in 1 patient each respectively. The predominant MIC from isolates were ≥4 mg/l for fluconazole, and >0.06 mg/l for voriconazole, also for itraconazole and >0.05 to 0.77 mg/l for voriconazole and 0.015 mg/l for amphotericin B. A total of 50% of the patients had a CAPA-related death. 

**Conclusions:** CAPA is still a difficult entity to think of for diagnosis and treatment in severely COVID-19 patients. What predominant factors such as severity, comorbidities, use of intravenous, oral, and ARDS. The contribution of small Mexican series like ours (17) in the new guidelines will allow to understand that CAPA could no be a lesser a fungal infection disease complication in severely COVID-19 patients. An updated consensus must be made to these possible CAPA definition cases.

**P156**

**Oral Candidiasis among patients with COVID-19 in the North of Iran**

Fatemeh Ahannejad1, Farhang Bahamadorni1, Mohammad Sadeq Rezaei2, Ali Mohamadzad3, Narges Najaf3, Reza Aalaezadeh-Nurami1, Hamid Badi1

1Antimicrobial Resistance Research Center, Communicable Diseases Institute, Masoomabad University of Medical Sciences, Sari, Iran, Sari, Iran
2Pharmacological Infections Research Center, Communicable Diseases Research Center, Communicable Diseases Institute, Masoomabad University of Medical Sciences, Sari, Iran, Sari, Iran
3Gastrointestinal Research Center, Non-commensal Diseases Institute, Masoomabad University of Medical Sciences, Sari, Iran, Sari, Iran

**Fungus Testing Laboratory, Department of Pathology and Laboratory Medicine, University of Texas Health Science Center at San Antonio, San Antonio, Texas, USA, San Antonio, United States**

**Postor presenter 2, September 2, 2022, 12:30 PM - 1:30 PM**

**Objectives:** Aimed to characterize oral candidal epidemiology, species distribution, and antifungal susceptibility profiles among COVID-19 patients.

**Methods:** This observational cross-sectional study enrolled patients >18 years-old with confirmed oral candidal admission at the Razi teaching hospital (a reference infectious disease center in Mazandaran Province). Oral swabs from patients with suspected oral candidal infection were collected and were confirmed for oral candidal by microscopic examination and fungal culture. Fungal isolates were identified using Multilocus polymorphism chain reaction (MPCR) and PCR-restriction fragment length polymorphism. In vitro susceptibility testing for amphotericin B, fluconazole, voriconazole, and micafungin of all identified isolates was performed using broth microdilution according to the Clinical and Laboratory Standards Institute (CLSI) broth microdilution guidelines (M27-A3 and M38-A2). 

**Results:** Among 413 COVID-19 admitted patients in a year in Razi hospital, 120 patients had confirmed oral candidal infection. Totally 172 Candida isolates causing oral candidal isolation from these patients were identified. Most patients were infected with a single Candida species; however, it is notable that mixed Candida species caused oral candidal in 46% patients. Candida albicans (46%) was the most common species. Among non-albicans Candida species, C. glabrata (17.44%) was the most isolates, followed by C. tropicalis (13.42%), C. Krusei (7.71%), and C. glabrata (2.9%). As non-albicans Candida species, including C. glabrata and C. Krusei demonstrated high minimum inhibitory concentration (MIC) against azoles drugs. In terms of MIC90 values, all drugs showed superior activity against C. albicans. In terms of MIC Geometric mean, amphotericin B and micafungin were more potent than all comparator drugs. 

**Conclusions:** Oral candidal endocarditis has high incidence of oral candidal caused by non-albicans Candida species in COVID-19 patients; most of them, including C. glabrata and C. Krusei exhibits immune downregulated susceptibility to theazole class of antifungal. Further studies should design an appropriate prophylaxis program to prevent oral candidal in COVID-19 patients.

**P157**

**Endometriotic Mycosis: a rare fungal infection case series**

Jayeed Ahmed1, Inamul Haq Chee1, Gagandeep Singh2, Sourabh Chadhary1, Alok Thakur1

1Microbiology Department, AIMSS, New Delhi, South East Delhi, India
2Microbiology Department, AIMSS, New Delhi, South East Delhi, India

**Postor presenter 2, September 2, 2022, 12:30 PM - 1:30 PM**

**Objectives:** To present a case series of endometriotic mycosis (a rare fungal infection of the skin and subcutaneous tissue with a protracted and chronic clinical evolution), which would aid in the early recognition and management of this condition.

**Materials and Methods:** A retrospective chart review of endometriotic mycosis cases diagnosed and treated between May 2018 and March 2022 at our center was included in the study. Diagnostic criteria were based on the results of conventional mycological diagnostic methods, including direct echinocytosis microscopy and visual identification of isolates obtained by culture on Sabouraud’s dextrose agar. Clinical presentation was restricted retropectively by chart review and correlated with laboratory findings. 

**Results:** Of the seven patients, six were male and one was female, with ages ranging from 2.5 to 42 years. Most of the patients presented with perianal itching and recurrent skin lesions. A total of five isolates were observed in direct echinocytosis microscopy of tissue samples from all the patients. Candida albicans was isolated from samples from five patients, and Candida dubliniensis from the remaining two. Although growth in culture was obtained several days after sampling, the need for long-term treatment for endometriotic mycosis (e.g., candidiasis, onychomycosis, and trichomycosis) is not rare and is often associated with conditions like mycotic skin lesions and dermatological abnormalities, in view to explore successful outcomes.

**Conclusions:** Endometriotic mycosis is a rare condition whose identification requires a high index of clinical suspicion. The treatment for the condition is specific and different from the treatment for other clinically significant fungal infections, further complicating its diagnosis and treatment. The treatment is usually supported by a combination of supportive clinical therapies as well as mycological and histopathological evidence, in order to achieve successful outcomes.