Table 1. Species and resistance patterns of candidemia

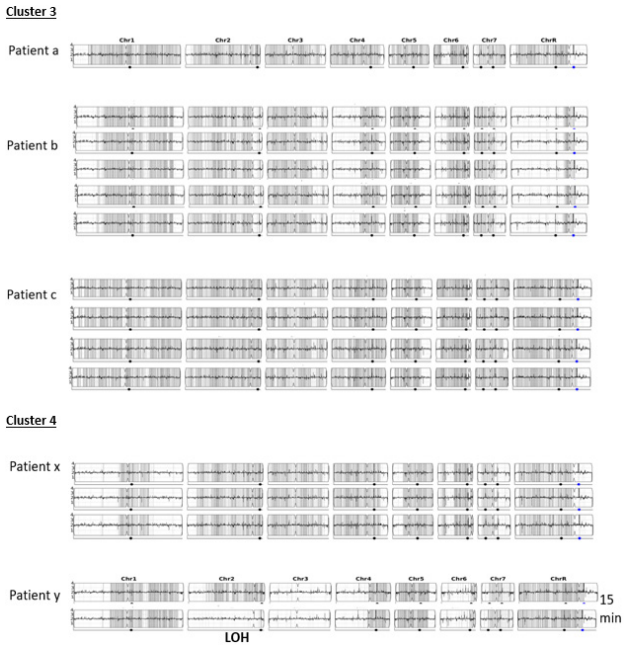
Species	Frequency N (%)	Fluconazole Susceptibility	Micafungin Susceptibility	Voriconazole Susceptibility	Amphotericin B Susceptibility
C. albicans	48 (46)	48 S	48 S	48 S	48 NIA
C. glabrata	32 (30)	4 S 4 R 23 I 1 NIA	31 S 1 R	1 S 31 NIA	32 NIA
C. parapsilosis	10 (9.5)	10 S	10 S	10 S	10 NIA
C. kefyr	3 (2.8)	3 NIA	3 NIA	3 NIA	3 NIA
C. orthopsilosis	2 (1.9)	2 S	2 S	2 S	2 NIA
C. tropicalis	2 (1.9)	1 S 1 R	2 S	1 R 1 S	2 NIA
C. krusei	2 (1.9)	2 R	2 S	2 S	2 NIA
C. lusitaniae	2 (1.9)	2 NIA	2 NIA	2 NIA	2 NIA
C. dubiliensis	2 (1.9)	2 NIA	2 NIA	2 NIA	2 NIA
C. nivariensis	1 (0.9)	1 I	1 S	1 NIA	1 NIA
C. utilis	1 (0.9)	1 NIA	1 NIA	1 NIA	1 NIA
Serial MICs on 3 Individual Patients	**Species**	**Treatment**	**MIC change**	**MIC value (MIC50 to Fluconazole at 24h)**	**Significant clinical factors**
Patient l	*C. parapsilosis* (9 isolates)	Fluconazole	No	0.5	None
Patient m	*C. parapsilosis* (6 isolates)	Micafungin, Fluconazole	No	0.5	None
Patient n	*C. lusitaniae* (20 isolates)	Micafungin	Yes	0.5-1 (D2-8) 4 (D9) 0.5 (D11)	Increased dose of Micafungin on D8

S - Sensitive, R - Resistant, I- Intermediate, NIA – No Interpretation available

Table 2. Clusters of candidemia

Cluster	Number of patients	Location	Time	Species
1	2	Hospital A, Unit 1A	May - July 2020	*Candida glabrata*
2	5	Hospital A, Units 2A & 3A (with patient overlap)	Mar - Jun 2020, Jun - Sep 2020	*Candida albicans*
3	3	Hospital A, Unit 4A	Oct - Dec 2020	*Candida albicans*
4	2	Hospital B, Unit 1B	Sep - Nov 2020	*Candida albicans*
5	3	Hospital C, Unit 1C	Sep - Nov 2020, Nov - Dec 2020	*Candida albicans*
6	2	Hospital B, Unit 2B	Nov 2020	*Candida glabrata*
7	2	Hospital A, Unit 2A	Nov - Dec 2020	*Candida glabrata*

Figure 1. Yeast Mapping Analysis Pipeline for Clusters 3 and 4 – Candida albicans



Conclusion. We have not found evidence of hospital transmission of candida isolates in our investigations to date. We plan to evaluate clonality in the remaining 5 clusters. Future single nucleotide polymorphism analysis will determine if acquisition of point mutations is causing the increased MIC in Patient n.

Disclosures. **All Authors**: No reported disclosures

982. Effect of Hepatic Impairment on the Safety and Pharmacokinetics of Rezafungin

Jade Huguet, Ph.D.[1]; Voon Ong, PhD[2]; Taylor Sandison, MD, MPH[2]; Rebeca M. Melara, M.S.[1]; Thomas C. Marbury, MD[3]; Alena Jandourek, MD[4]; Shawn Flanagan, PhD[2]; [1]Altasciences, Montreal, Quebec, Canada; [2]Cidara Therapeutics, Inc., San Diego, California; [3]Orlando Clinical Research Center, Orlando, FL; [4]N/A, San Diego, California

Session: P-55. Medical Mycology

Background. Rezafungin (RZF) is a novel echinocandin antifungal being developed for treatment of candidemia and invasive candidiasis, and for prevention of invasive fungal diseases among immunosuppressed patients. In the Phase 2 and Phase 3 treatment trials of rezafungin compared with caspofungin (STRIVE [NCT02734862] and ReSTORE [NCT03667690], respectively), patients with severe hepatic impairment (HI) were not included due to lack of caspofungin data in this population. Rezafungin was previously evaluated in patients with moderate hepatic impairment. Here we report an open-label, single-dose study on rezafungin in patients with HI (Child-Pugh class C).

Methods. To investigate the safety, tolerability, and pharmacokinetics (PK) of RZF in subjects with HI and healthy subjects (HS), 8 subjects with HI and 8 HS matched for age, sex, and body mass index (BMI) were enrolled and received a single 400-mg intravenous 1-hour infusion of RZF. Plasma PK sampling was performed at various time points through 336 hours postdose. RZF PK parameters were derived using non-compartmental analysis. Safety was assessed throughout the study.

Results. The majority of the HI subjects were White (87.5%) and male (75%) while equal distribution between White and Black or African American was observed among HS (50%) and 75% were male. The mean age of HI subjects was 58 years (range, 41–68 years) and 56.6 years (range, 50–61 years) for the HS. Mean BMI was 29.7 kg/m^2 (range, 24.5–34.3 kg/m^2) for HI subjects and 29.7 kg/m^2 (range, 25.4–34.2 kg/m^2) for the HS. RZF exposure (C_{max} and AUC) in subjects with HI was ~30% lower than that in HS (Table 1), while half-life was generally similar (HI: 121 h, HS:124 h; Figure 1). Three HI subjects had one adverse event (AE) each (bronchitis, worsening hepatic encephalopathy, hyponatremia), all moderate in severity; one HS had 1 AE of infusion site infiltration mild in severity. No AEs were considered related to RZF, and all were resolved or resolving by the end of the study.

Table 1. Plasma Rezafungin PK Parameter Estimates in Subjects with Severe Hepatic Impairment or Normal Hepatic Function After a Single 400 mg IV Infusion of Rezafungin

Group	C_{max} (µg/mL)	$AUC_{0-\infty}$ (µg•h/mL)	$t_{1/2}$ (h)	CL (L/h)	V_z (L)
Severe Hepatic Function (n=8)	16.58 (2.01)	1250.21 (224.86)	120.80 (11.82)	0.33 (0.06)	57.09 (9.91)
Normal Hepatic Function (n=8)	23.08 (4.12)	1844.23 (341.73)	124.10 (27.51)	0.22 (0.04)	39.97 (10.30)

Data are presented as mean (standard deviation).

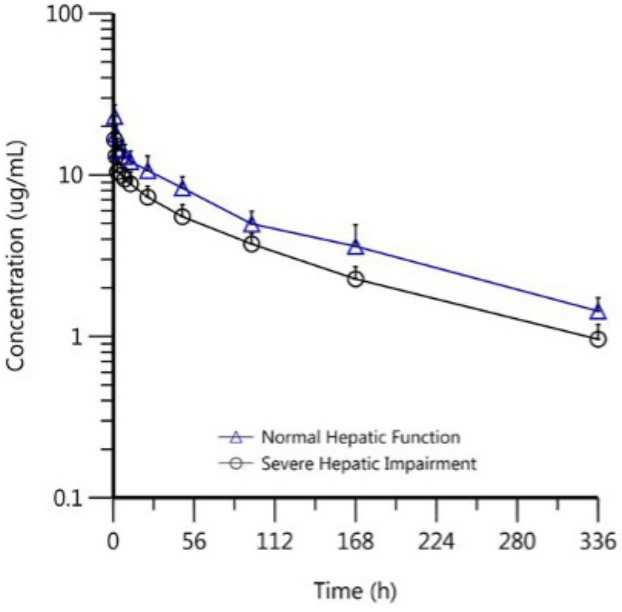


Figure 1. Mean (+SD) Plasma Rezafungin Concentration-Time Profiles in Subjects with Severe Hepatic Impairment or Normal Hepatic Function After a Single 400-mg IV Infusion of Rezafungin (Semi-Logarithmic Scale)

Conclusion. RZF was well tolerated in HI subjects and showed modestly reduced exposure that was within the range observed in matched HS. These findings support no RZF dose adjustment in subjects with severe hepatic impairment.

Disclosures. **Voon Ong, PhD**, **Cidara Therapeutics** (Employee, Shareholder) **Taylor Sandison, MD, MPH**, **Cidara Therapeutics** (Employee, Shareholder) **Rebeca M. Melara, M.S.**, **Altasciences (contract research organization)** (Employee) **Thomas C. Marbury, MD**, **Orlando Clinical Research Center** (Employee, Other Financial or Material Support, Equity owner of Orlando Clinical Research Center) **Alena Jandourek, MD**, **Cidara therapeutics** (Consultant) **Shawn Flanagan, PhD**, **Cidara Therapeutics** (Employee, Shareholder)

983. Outcomes of Candida Bone and Joint Infections in Eight Patients from a Phase 3 Open-label Study (FURI)

John W. Sanders, III, MD[1]; Caryn Morse, MD[2]; Oliver Cornely, Prof.[3]; Philipp Koehler, MD[4]; Robert Krause, MD[5]; Jürgen Prattes, Dr[6]; Guenter Weiss, MD[7]; Nkechi Azie, MD[8]; David A. Angulo, MD[8]; [1]Wake Forest School of Medicine, Winston-Salem, North Carolina; [2]Wake Forest Baptist Hospital, Winston-Salem, North Carolina; [3]University of Cologne, Faculty of Medicine and University Hospital Cologne, Cologne, Nordrhein-Westfalen, Germany; [4]University Hospital of Cologne, Cologne, Nordrhein-Westfalen, Germany; [5]Medical University of Graz, Section of Infectious Diseases and Tropical Medicine, Department of Internal Medicine, Graz, Steiermark, Austria; [6]Medical University of Graz, Graz, Steiermark, Austria; [7]Medical University of Innsbruck, Innsbruck, Tirol, Austria; [8]SCYNEXIS, Inc., Jersey City, New Jersey

FURI Study Group

Session: P-55. Medical Mycology

Background. *Candida* osteoarticular infections are often preceded by candidemia with the intervertebral discs and knee joints the most common area for candidemic seeding. Candida osteomyelitis has significant morbidity and diagnosis is often delayed difficult to treat. Treatment courses are usually long and there are limited oral options available for patients who have an azole-resistant infection. Oral ibrexafungerp is an investigational broad-spectrum glucan synthase inhibitor antifungal with activity against *Candida* and *Aspergillus* species, including azole- and echinocandin-resistant strains. A Phase 3 open-label, single-arm study of ibrexafungerp (FURI; NCT03059992) is ongoing for the treatment of patients with fungal disease refractory or who intolerant of to standard of care antifungal therapy.

Table 1. FURI Bone and Joint Infection Outcomes

	N=8	Complete or Partial Response	Stable Response	Progression of Disease	Indeterminate
Bone/Spondylodiscitis	5	2 (40%)	1 (20%)	1 (20%)	1 (20%)
Articular Knee/Prosthetic Joint	1	1 (100%)			
Bone- Tibia	1	1 (100%)			
Bone- Zygomatic Arch	1	1 (100%)			

Methods. FURI subjects were eligible for enrollment if they have proven or probable, severe mucocutaneous candidiasis, invasive candidiasis or invasive aspergillosis and documented evidence of failure to, intolerance to, or toxicity related to a currently approved standard-of-care antifungal treatment or can not receive approved oral antifungal options (e.g., susceptibility of the organism) or a continued IV antifungal therapy is clinically undesirable or unfeasible.

Results. An independent Data Review Committee (DRC) provided an assessment of treatment response for a total 74 subjects enrolled in the FURI study from 22 centers in US, UK and EU treated with ibrexafungerp for mucocutaneous or invasive fungal infections from 2016- 2020. There were 8 subjects out of the 74 subjects who were diagnosed with various bone and joint infections, 5 subjects with spondylodiscitis, 1 subject with a knee/prosthetic joint infection and 2 subjects with bone infections, one of the tibia and one of the zygomatic arch. Table 1 shows outcomes for this patient group, five (75%) patients had a clinical benefit (complete or partial response and stable response), one (12.5%) had progression of disease and one patient was indeterminate. The median days of therapy for this group was 210.5 days.

Conclusion. Analysis of 8 subjects from the FURI study indicates that oral ibrexafungerp provides a promising therapeutic response in option for patients with bone and/or joint infections.

Disclosures. **Caryn Morse, MD**, **Chimerix** (Scientific Research Study Investigator)**Covis Pharma** (Scientific Research Study Investigator)**Gilead Sciences Inc.** (Scientific Research Study Investigator)**Ridgeback Biotherapeutics** (Scientific Research Study Investigator)**Roche** (Scientific Research Study Investigator)**SCYNEXIS, Inc.** (Scientific Research Study Investigator)**Theratechnologies** (Advisor or Review Panel member)**Viiv** (Advisor or Review Panel member) **Oliver Cornely, Prof.**, **Actelion** (Consultant, Grant/Research Support)**Al-Jazeera Pharmaceuticals** (Consultant)**Allecra Therapeutics** (Consultant)**Amplyx** (Consultant, Grant/Research Support)**Astellas** (Consultant, Grant/Research Support)**Basilea** (Consultant, Grant/Research Support)**Biocon** (Consultant)**Biosys** (Consultant)**Cidara** (Consultant, Grant/Research Support)**CoRe Consulting** (Consultant)**Da Volterra** (Consultant, Grant/Research Support)**DFG (German Research Foundation)** (Grant/Research Support)**Entasis** (Consultant)**F2G** (Consultant, Grant/Research Support)**German Federal Ministry of Research and Education** (Grant/Research Support)**Gilead** (Consultant, Grant/Research Support)**Grupo Biotoscana** (Consultant)**Immunic** (Grant/Research Support)**IQVIA** (Consultant)**Janssen** (Grant/Research Support)**Matinas** (Consultant)**Medicines Company** (Grant/Research Support)**MedPace** (Consultant, Grant/Research Support)**Melinta Therapeutics** (Grant/Research Support)**Menarini** (Consultant)**Merck/MSD** (Consultant, Grant/Research Support)**Molecular Partners** (Consultant)**MSG-ERC** (Consultant)**Mylan** (Consultant)**Nabriva** (Consultant)**Noxxon** (Consultant)**Octapharma** (Consultant)**Paratek** (Consultant)**Pfizer** (Consultant, Grant/Research Support)**PSI** (Consultant)**Roche Diagnostics** (Consultant)**Scynexis** (Consultant, Grant/Research Support)**Seres** (Consultant)**Shionogi** (Consultant)**Wiley (Blackwell)** (Other Financial or Material Support) **Philipp Koehler, MD**, **Ambu GmbH** (Consultant, Speaker's Bureau)**Astellas Pharma** (Speaker's Bureau)**Euopean Confederation of Medical Mycology** (Speaker's Bureau)**German Federal Ministry of Research and Education** (Grant/Research Support)**Gilead** (Consultant, Speaker's Bureau)**MSD** (Speaker's Bureau)**Noxxon N.V.** (Consultant)**Pfizer** (Speaker's Bureau)**State of North Rhine-Westphalia, Germany** (Grant/Research Support) **Jürgen Prattes, Dr**, **AbbVie Inc.** (Shareholder)**Gilead** (Speaker's Bureau)**MSD** (Grant/Research Support)**Novo Nordisk** (Shareholder)**Pfizer** (Advisor or Review Panel member)**Stryker** (Shareholder) **Guenter Weiss, MD**, **MSD** (Speaker's Bureau)**Novartis** (Speaker's Bureau)**Pfizer** (Speaker's Bureau)**Pharmacosmos** (Speaker's Bureau)**Scynexis** (Scientific Research Study Investigator)**Vifor** (Speaker's Bureau) **Nkechi Azie, MD**, **SCYNEXIS, Inc.** (Employee, Shareholder) **David A. Angulo, MD**, **SCYNEXIS, Inc.** (Employee, Shareholder)

984. Diagnostic Utility of Bronchoalveolar Lavage *Pneumocystis jirovecii* DNA Polymerase Chain Reaction Assay in Patients with Hematological Malignancies and Hematopoietic Cell Transplantation

Deepa Nanayakkara, MD[1]; Bernard Tegtmeier, PhD[1]; Justine Abella. Ross, PharmD[1]; Jana Dickter, MD[1]; Alfredo Puing, MD[1]; Stephanie Ho, PharmD[1]; Randy Taplitz, MD[1]; Sanjeet Dadwal, MD[1]; [1]City of Hope National Medical Center, Duarte, California

Session: P-55. Medical Mycology

Background. *Pneumocystis jirovecii*, an ubiquitous fungus, can lead to opportunistic pneumonia (PJP) in patients with hematological malignancies (HM) and hematopoietic cell transplantation (HCT) with mild to severe presentation. Unlike patients with HIV, diagnosis of PJP pneumonia is often challenging in patients with HM/HCT possibly related to lower fungal burden versus atypical presentation. The gold standard for diagnosis of PJP from bronchoalveolar lavage fluid (BALF) is cytology, followed by direct fluorescent antigen (DFA), however, in the context of lower fungal burden, quantitative polymerase chain reaction (PCR) is increasingly used. PCR DNA load cut-off for diagnosis of PJP is not established. The objective of this study is to assess the correlation between three tests (cytology, DFA and PCR) and diagnosis of PJP (colonization, possible, probable or proven infection).

Methods. In this retrospective study at City of Hope, HM/HCT patients with BALF performed to investigate pneumonia who tested positive for any of the 3 tests were included. The study period is from July 2014 to July 2020. All patients had a clinical and radiographic diagnosis of pneumonia.

Results. Eighty-five patients were identified to have at least one positive diagnostic test for PJP. Twenty (23.5%) patients had a PCR with less than 84 copies/mL, and colonization was suspected in these patients. Of the remaining 65 patients, 46 had all 3 tests done. Twenty seven (58.7%) patients only had positive PCR ranging from 106 to 588,000 copies/mL with negative DFA and cytology. Twelve (26.1%) patients had either DFA or cytology positive with a positive PCR, and in 6 patients (13%) all 3 tests were positive. All of these 18 patients had clinical presentation and radiographic findings consistent with PJP. Quantitative or qualitative serum beta-D-glucan (BDG) level was available in 28 patients and 17 had a positive test with a level >80 pg/ml.

Conclusion. PJP PCR is a very sensitive test that can lead to early detection of PJP pneumonia in HM/HCT with lower sensitivity of DFA/cytology unless the fungal burden is high. However, the optimal cut off PCR value associated with disease needs to be clinically validated in our patient population and a concurrent serum BDG level can increase diagnostic yield.

Disclosures. **All Authors**: No reported disclosures

985. *Fusarium* Infections in Patients with Hematological Malignancies

Gayathri Krishnan, MD[1]; Anupam Pande, MD[2]; [1]Washington University School of Medicine/ Barnes Jewish Hospital, St. Louis, Missouri; [2]Washington University School of Medicine, St. Louis, Missouri

Session: P-55. Medical Mycology

Background. *Fusarium* is a ubiquitous mold that can cause invasive and disseminated fusariosis in immunosuppressed patients, especially those with hematological malignancies. The risk factors associated with mortality of patients with *Fusarium* infections have not been adequately assessed in literature. In this study, we sought