

Supplementary Table 1. Included studies' characteristics

Study, year published	Number of patients	Age (years)	Gender	Site of infection, n (%)	Microbiology of infection, n (%)	Treatment administered	Infection Outcomes, n (%)
Woods et al, 1989 [11]	1	19	Male	TrV 1 (100)	<i>Aspergillus flavus</i> 1 (100)	Amphotericin B 1 (100)	Clinical cure ^a 0 (0) Overall mortality 1 (100) IE-specific mortality 1 (100)
Estol et al, 1991 [12]	1	55	Female	AoV 1 (100)	<i>Staphylococcus aureus</i> 1 (100)	NR 1 (100)	Clinical cure 0 (0)

							Overall mortality 1 (100) IE-specific mortality 1 (100)
Welty et al, 1992 [13]	1	53	Male	PV 1 (100)	<i>Pseudallescheria boydii</i> 1 (100)	No antifungals 1 (100)	Clinical cure 0 (0) Overall mortality 1 (100) IE-specific mortality 1 (100)

David et al, 1992 [14]	1	56	Female	AoV 1 (100)	<i>Corynebacterium jeikeium</i> 1 (100)	Cephalosporin 1 (100) Vancomycin 1 (100) Surgical management 1 (100)	Clinical cure 1 (100) Overall mortality 0 (0)
Miga et al, 1996 [15]	1	1.33	Male	TrV 1 (100)	<i>Staphylococcus aureus</i> 1 (100)	NR 1 (100) Surgical management 1 (100)	Clinical cure 1 (100) Overall mortality 0 (0)
Heath et al, 1997 [16]	1	45	Male	MV 1 (100) TrV 1 (100)	<i>Phaeoacremonium parasiticum</i> 1 (100)	NR 1 (100)	Clinical cure 0 (0) Overall

							mortality 1 (100) IE-specific mortality 1 (100)
Paterson et al, 1997 [17]	10	Median 55 Range (39-61)	9 male 1 female	AoV 5 (50) Mural 3 (30) MV 2 (20) TrV 1 (10) PV 1 (10)	<i>Aspergillus</i> <i>fumigatus</i> 4 (40) <i>Staphylococcus</i> <i>aureus</i> 4 (40) <i>Enterococcus</i> <i>faecium</i> 1 (10) <i>Enterococcus</i> <i>faecalis</i> 1 (10)	Vancomycin 5 (50) Aminoglycoside 3 (30) Amphotericin B 3 (30) Rifampicin 2 (20) Quinolone 1 (10) No antimicrobial used 1 (10)	Clinical cure 4 (40) Overall mortality 6 (60) IE-specific mortality 6 (60)

						Anti-staphylococcal penicillin 1 (10) Surgical management 3 (30)	
Hearn et al, 1999 [18]	1	59	Female	PV 1 (100)	<i>Staphylococcus aureus</i> 1 (100)	Vancomycin 1 (100) Rifampicin 1 (100) Surgical management 1 (100)	Clinical cure 1 (100) Overall mortality 0 (0)
Avery et al, 1999 [19]	1	41	Female	TrV 1 (100)	<i>Listeria monocytogenes</i> 1	Aminopenicillin 1 (100)	Clinical cure 1 (100)

					(100)	Aminoglycoside 1 (100)	Overall mortality 0 (0)
Lorf et al, 1999 [20]	1	60	Male	Mural 1 (100)	<i>Aspergillus</i> spp. 1 (100)	NR 1 (100)	Clinical cure 0 (0) Overall mortality 1 (100) IE-specific mortality 1 (100)
Moreira et al, 2000 [21]	1	64	Male	AoV 1 (100) MV 1 (100)	<i>Cutibacterium</i> <i>(Propionibacterium)</i> <i>acnes</i> 1 (100)	Vancomycin 1 (100) Aminoglycoside 1 (100)	Clinical cure 1 (100) Overall mortality 0 (0)

						Surgical management 1 (100)	
Romagnuolo et al, 2000 [22]	1	37	Male	Mural 1 (100)	<i>Aspergillus</i> spp. 1 (100)	Amphotericin B 1 (100)	Clinical cure 1 (0) Overall mortality 1 (100) IE-specific mortality 1 (100)
Gotsman et al, 2003 [23]	1	33	Male	TrV 1 (100)	<i>Staphylococcus</i> <i>aureus</i> 1 (100)	Vancomycin 1 (100) Aminoglycoside 1	Clinical cure 1 (100) Overall

						(100) Surgical management 1 (100)	mortality 0 (0)
Haddad et al, 2004 [24]	1	48	Female	MV 1 (100)	<i>Staphylococcus aureus</i> 1 (100)	Anti- staphylococcal penicillin 1 (100) Rifampicin 1 (100)	Clinical cure 0 (0) Overall mortality 1 (100) IE-specific mortality 1 (100)
Ruttman et al, 2005 [25]	7	Median 53 Range (40-60)	6 male 1 female	AoV 7 (100) MV 4 (57.1)	Coagulase-negative <i>Staphylococcus</i> 3	NR 7 (100) Surgical	Clinical cure 2 (28.6)

					(42.9) <i>Staphylococcus aureus</i> 2 (28.6) <i>Aspergillus</i> spp. 2 (28.6) <i>Enterococcus</i> spp. 2 (28.6) <i>Enterobacter</i> spp. 1 (14.3)	management 2 (28.6)	Overall mortality 5 (71.4) IE-specific mortality 5 (71.4)
Salamon et al, 2006 [26]	1	26	Female	TrV 1 (100) PV 1 (100)	<i>Candida albicans</i> 1 (100)	Fluconazole 1 (100) 5-fluocytosine 1 (100) Caspofungin 1 (100)	Clinical cure 1 (100) Overall mortality 0 (0)

						Surgical management 1 (100)	
Goegele et al, 2007 [27]	1	45	Male	AoV 1 (100)	Coagulase-negative <i>Staphylococcus</i> 1 (100) <i>Klebsiella terrigena</i> 1 (100)	Carbapenem 1 (100) Vancomycin 1 (100) Linezolid 1 (100)	Clinical cure 0 (0) Overall mortality 1 (100) IE-specific mortality 1 (100)
Vianna et al, 2007 [28]	1	41	Male	Mural 1 (100)	<i>Aspergillus</i> <i>fumigatus</i> 1 (100)	Amphotericin B 1 (100) Voriconazole 1	Clinical cure 1 (100) Overall

						(100) Caspofungin 1 (100) Surgical management 1 (100)	mortality 0 (0)
Kumar et al, 2007 [29]	1	58	Male	AoV 1 (100)	<i>Staphylococcus schleiferi</i> 1 (100)	Vancomycin 1 (100) Aminoglycoside 1 (100) Rifampicin 1 (100)	Clinical cure NR (100) Overall mortality 1 (100) IE-specific mortality 0 (0)
Goegele et al,	1	53	Male	AoV 1 (100)	Coagulase-negative	Teicoplanin 1	Clinical cure 0

2007 [30]					<i>Staphylococcus</i> 1 (100) <i>Klebsiella terrigena</i> 1 (100)		(0) Overall mortality 1 (100) IE-specific mortality 1 (100)
Mourier et al, 2009 [31]	1	0.67	Male	MV 1 (100)	<i>Aspergillus</i> spp. 1 (100)	Amphotericin B 1 (100) Voriconazole 1 (100)	Clinical cure 1 (100) Overall mortality 0 (0)
Vernadaki et al, 2009 [32]	1	55	Male	AoV 1 (100) TrV 1 (100)	<i>Staphylococcus aureus</i> 1 (100)	Daptomycin 1 (100) Surgical	Clinical cure 1 (100) Overall

						management 1 (100)	mortality 0 (0)
Forrest et al, 2011 [33]	8	Median 46 Range (26-74)	3 male 5 female	MV 6 (75) AoV 2 (25) TrV 1 (12.5)	<i>Enterococcus faecalis</i> 6 (75) <i>Enterococcus faecium</i> 2 (25)	Aminoglycoside 7 (87.5) Anti- staphylococcal penicillin 6 (75) Daptomycin 2 (25) Tigecycline 1 (12.5) Surgical Management 5 (62.5)	Clinical cure 6 (75) Overall mortality 2 (25) IE-specific mortality 2 (25)
Walter et al,	1	63	Male	MV 1 (100)	<i>Staphylococcus</i>	NR 1 (100)	Clinical cure 0

2011 [34]					<i>aureus</i> 1 (100)	Surgical management 1 (100)	(0) Overall mortality 1 (100) IE-specific mortality 0 (0)
Castelli et al, 2011 [35]	1	36	Male	MV 1 (100)	<i>Corynebacterium</i> spp. 1 (100) <i>Nocardia</i> spp. 1 (100)	Vancomycin 1 (100) Co-trimoxazole 1 (100) Surgical management 1 (100)	Clinical cure 1 (100) Overall mortality 0 (0)
Mrzljak et al,	1	63	Male	MV 1 (100)	<i>Staphylococcus</i>	Anti-	Clinical cure 1

2012 [36]					<i>lugdunensis</i> 1 (100)	staphylococcal penicillin 1 (100) Vancomycin 1 (100) Surgical management 1 (100)	(100) Overall mortality 0 (0)
George et al, 2013 [37]	1	51	Male	MV 1 (100)	<i>Escherichia coli</i> 1 (100)	Carbapenem 1 (100) Tigecycline 1 (100)	Clinical cure 1 (100) Overall mortality 0 (0)
Belvisi et al, [38]	1	61	Female	MV 1 (100)	<i>Streptococcus pneumoniae</i> 1 (100)	Linezolid 1 (100) Cephalosporin 1 (100)	Clinical cure 1 (100) Overall

							mortality 0 (0)
Borde et al, 2013 [39]	1	36	Female	AoV 1 (100)	<i>Streptococcus viridans</i> 1 (100)	Cephalosporin 1 (100) Surgical management 1 (100)	Clinical cure 1 (100) Overall mortality 0 (0)
Fernández-Hidalgo [40]	2	56, 78	2 male	MV 1 (50) AoV 1 (50)	<i>Enterococcus faecalis</i> 2 (100)	Cephalosporin 2 (100) Aminopenicillin 2 (100) Surgical management 1 (50)	Clinical cure 2 (100) Overall mortality 0 (0)
Dahya et al	1	62	Male	AoV 1 (100)	<i>Peptostreptococcus</i>	Vancomycin 1	Clinical cure 1

[41]					spp. 1 (100)	(100) Cephalosporin 1 (100) Surgical management 1 (100)	(100) Overall mortality 0 (0)
Lewis et al, 2016 [42]	1	63	Male	TrV 1 (100)	<i>Enterococcus</i> <i>faecium</i> 1 (100)	NR 1 (100)	Clinical cure 0 (0) Overall mortality 1 (100) IE-specific mortality 1 (100)

Blackwood et al, 2017 [43]	1	4	Female	NR 1 (100)	<i>Staphylococcus aureus</i> 1 (100)	NR 1 (100)	Clinical cure 1 (100) Overall mortality 0 (0)
Alsobayeg et al, 2018 [44]	1	56	Female	AoV 1 (100) MV 1 (100) TrV 1 (100)	<i>Aspergillus flavus</i> 1 (100)	Amphotericin B 1 (100) Surgical management 1 (100)	Clinical cure 0 (0) Deaths overall 1 (100) IE-specific mortality 1 (100)
Kim et al, 2018 [45]	1	61	Male	Mural 1 (100)	<i>Aspergillus</i> spp. 1 (100)	Voriconazole 1 (100)	Clinical cure 0 (0) Overall

							mortality 1 (100) IE-specific mortality 1 (100)
Albuquerque et al, 2019 [6]	1	62	Male	AoV 1 (100)	<i>Proteus mirabilis</i> 1 (100)	Aminopenicillin 1 (100) Antistaphylococcal penicillin 1 (100) Antipseudomonal penicillin 1 (100) Surgical management 1 (100)	Clinical cure 1 (100) Overall mortality 0 (0)

Abbo et al, 2019 [46]	1	68	Male	MV 1 (100)	<i>Enterococcus faecium</i> 1 (100)	Aminopenicillin 1 (100) Daptomycin 1 (100)	Clinical cure 1 (100) Overall mortality 0 (0)
Eid et al, 2020 [47]	1	65	Male	MV 1 (100)	<i>Staphylococcus epidermidis</i> 1 (100)	NR 1 (100) Surgical management 1 (100)	Clinical cure 1 (100) Overall mortality 0 (0)
Thavamani et al, 2020 [48]	1	18	Male	NR 1 (100)	<i>Klebsiella</i> spp. 1 (100) <i>Escherichia coli</i> 1 (100)	NR 1 (100)	Clinical cure 1 (100) Overall mortality 0 (0)

^a Defined as clinical resolution of the infection as a result of treatment.

AoV: aortic valve; IE: infective endocarditis; MV: mitral valve, NR: not reported; PV: pulmonary valve; TrV: tricuspid valve