

Activity of oritavancin against European bacterial pathogens associated with skin/wound and soft tissue infections and bacteraemia

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Objectives: Oritavancin (ORI) is a semisynthetic lipoglycopeptide in Phase 3 clinical development for the treatment of complicated skin and soft tissue infections. We evaluated ORI activity, relative to that of vancomycin (VAN) and 11 other comparators, against currently-circulating Gram-positive pathogens from patient specimen sources relevant to the Phase 3 studies that are presently underway. **Methods:** 643 single patient, non-consecutive *Staphylococcus aureus* (SA) and 125 beta-haemolytic streptococcal (BHS) isolates were collected in 2011-2012 from 9 sites distributed across Europe. Each bacterial isolate was sub-cultured for inoculum preparation and was subjected to broth microdilution testing and in accordance with CLSI M7 and M100 guidelines. Results were interpreted using EUCAST breakpoints. From the resulting database, this analysis focused on the activities of ORI and VAN against blood and skin/wound isolates. **Results:** The following table shows ORI and VAN activity according to specimen source. **Conclusions:** These findings demonstrate that against both SA (both MRSA and MSSA) and BHS, ORI maintained a comparable and high level of in vitro activity regardless of the clinical source of the pathogen. This level of activity was several-fold more potent than VAN, and underscores the strong potential ORI has for the treatment of infections caused by currently-circulating Gram-positive pathogens.

Organism	Source	N	ORI (mg/L)			VAN (mg/L)		
			Mode	MIC ₅₀	MIC ₉₀	Mode	MIC ₅₀	MIC ₉₀
All SA	Skin/Wound	213	0.03	0.03	0.06	0.5	0.5	0.5
	Blood	109	0.03	0.03	0.06	0.5	0.5	1
	Other	321	0.03	0.03	0.12	0.5	0.5	1
MRSA ¹	Skin/Wound	36	0.03	0.03	0.06	0.5	0.5	1
	Blood	25	0.03	0.03	0.12	0.5	0.5	1
	Other	101	0.03	0.03	0.12	0.5	0.5	1
MSSA ¹	Skin/Wound	177	0.03	0.03	0.06	0.5	0.5	0.5
	Blood	84	0.03	0.03	0.06	0.5	0.5	1
	Other	220	0.03	0.03	0.06	0.5	0.5	1
BHS ²	Skin/Wound	37	0.06	0.06	0.25	0.25	0.25	0.25
	Blood	36	0.06	0.06	0.25	0.25	0.25	0.5
	Other	52	0.06	0.06	0.5	0.25	0.25	0.5

¹ MRSA: Methicillin-resistant SA, MSSA: Methicillin-susceptible SA

² BHS consisted of 66 *S. agalactiae*, 52 *S. pyogenes*, 1 *Streptococcus* Group C, and 6 *Streptococcus* Group G isolates