

The Ferric uptake regulator (Fur) and iron availability control the production and maturation of the antibacterial peptide microcin E492

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© 2018 Marcoleta et al. This is an open access article distributed under the terms of the Creative Commons Attribution License, which permits unrestricted use, distribution, and reproduction in any medium, provided the original author and source are credited. Microcin E492 is a pore-forming bacteriocin with toxic activity against Enterobacteriaceae, which undergoes amyloid aggregation as a mechanism to regulate its toxicity. To be active, it requires the posttranslational attachment to the C-terminus of a glycosylated enterochelin derivative (salmochelin), a process carried out by the proteins MceC, MceI and MceJ encoded in the MccE492 gene cluster. Both microcin E492 and salmochelin have a proposed role in the virulence of the bacterial pathogen *Klebsiella pneumoniae*. Besides, enterochelin is produced as a response to low iron availability and its synthesis is controlled by the global iron regulator Fur. Since the production of active microcin E492 depends on enterochelin biosynthesis