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Chitosan: A Natural Antimicrobial Agent- A Review

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ABSTRACT

Chitosan is the second most abundant natural polymer after cellulose in the world; primarily composed of glucosamine and N-acetyl glucosamine residues with a 1, 4- β -linkage. Chitosan is considered as most promising materials for future applications on account of its excellent biodegradability, biocompatibility, antimicrobial activity, non-toxicity, and its economic advantages. This review presents an overview of sources, solubility, chemical properties, biological properties and mode of action of antimicrobial activities of chitosan.

Keywords: Chitosan, chitin, antimicrobial, degree of deacetylation (DD), biocompatibility.