

ABSTRACT

Probiotics are live microorganisms that confer health benefits to human when administered in adequate amount. They are mainly lactic acid bacteria (LAB) of the genera *Lactobacillus* and *Bifidobacterium*, although the probiotics potential of other bacteria and yeast are not excluded. Modulation of the immune system, anti-inflammatory effect, improved intestinal functioning, inhibition of pathogens and treatment of diseases such as traveler's diarrhea are among probiotics benefits. While several health ailments such as inflammatory bowel, diabetes, hepatic, neurological, respiratory and cardiovascular diseases and some cancer like colorectal cancer are associated with probiotics imbalances. Probiotics are mainly isolated from the human microbiota pool, feces, breast milk and fermented products. Also, fermented fruits and vegetable described as prebiotics are among sources of probiotics. They are rich in functional antioxidants that synergistically provides health benefits to human. In the present work, fruits and vegetable probiotics, isolation, characterization, health benefits and their application are reviewed.