

Essential oils, also called volatile odoriferous oil, are aromatic oily liquids extracted from different parts of plants, for example, leaves, peels, barks, flowers, buds, seeds, and so on. They can be extracted from plant materials by several methods, steam distillation, expression, and so on. Among all methods, for example, steam distillation method has been widely used, especially for commercial scale production (Cassel and Vargas 2006; Di Leo Lira and others 2009). Essential oils have been widely used as food flavors (Burt 2004). Essential oils found in many different plants, especially the aromatic plants, vary in odor and flavor, which are governed by the types and amount of constituents present in oils. Additionally, the amount of essential oil from different plants is different and this determines the price of essential oil. Apart from aromatic compounds, indigenous pigments contribute to varying colors of essential oil. This can affect the applications as the ingredient in some particular foods. Essential oils have been known to possess antioxidant and antimicrobial activities, thereby serving as natural additives in foods and food products. It can be used as active compounds in packaging materials, in which the properties of those materials, particularly water vapor barrier property associated with hydrophobicity in nature of essential oils, can be improved. Almost any part of a plant may be the source of the oil, which could be extracted and fully exploited for food applications or others. Modern technologies have been continuously developed to conquer the limitation of conventional methods, and to enhance the extraction efficacy. Due to the increasing attention in natural additives, essential oils from several plants have been used more widely, especially in conjunction with other preservations under concept of "hurdle technology." Thus, essential oils can serve as the alternative additives or processing aid as green technology.