

## **A Literature Review: The Anti-Obesity Effect of Epigallocatechin-3-Gallate of Camellia sinensis (Green Tea) Extraction as a Potential Adjuvant Therapy for Management Obesity**

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**Abstract :** Introduction: Obesity is a common disease with high prevalence especially in developing countries including Indonesia. The obesitygenic lifestyle such as excessive intake of food, sedentary lifestyle is the major environmental etiologies of obesity. Obesity is also as one of burden disease with high morbidity due to its complication, such as diabetes mellitus and hypertension. The objective of this literature review is to know how the Epigallocatechin-3-Gallate of Green tea or Camellia sinensis effect as anti-obesity agent and reduce the complication of obesity. Material and Methods: This study based on the secondary data analysis complemented by primary data collection from several journal and textbook. We identified the effect of Epigallocatechin-3-Gallate of Green tea or Camellia sinensis as adjuvant therapy for management obesity and to prevent the complications of obesity. Results: Based on the result, Green tea or Camellia sinensis contain Epigallocatechin-3-Gallate (EGCG) that has anti-obesity effect such as induce apoptosis, inhibit adipogenesis, increasing lipolytic activity, increasing fat oxidation and thermogenesis. Discussion: EGCG are naturally distributed in green tea, that contains a biological activity that has a potential effect to treat obesity. Conclusion: EGCG are capable to treat obesity. By consuming EGCG can prevent obesity in normal health person and prevent complication in patient with obesity.

**Keywords :** adjuvant therapy, anti-obesity effect, complication, epigallocatechin-3-gallate, obesity

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