

***Syzygiumcumini* (pomposia) active principles exhibit potent anticancer and antioxidant activities**

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The antioxidant and anticancer activities of fruit extracts (*Syzygiumcumini*) were investigated using the 2,2-diphenyl-1-picrylhydrazyl (DPPH) free radical-scavenging assay and viability of leukemia cancer cells (AML cell line) respectively. The successive extracts; hexane, chloroform, ether, ethyl acetate, ethanol and water were prepared and subjected to antioxidant activities and anticancer activities evaluation. The results showed that the ethanol extract had stronger antioxidant and antileukemia activities than the other ones. Spectroscopic analytical data of active ingredients separated from ethanol extract indicated that *S. cumini* fruit extracts contained phenolic compounds, such Kaempferol 7-O-methylether and sterols such as γ -Sitosterol responsible for their antioxidant and anticancer activities. A significant linear relationship between anticancer potency, free radical-scavenging ability and the content of active compounds of fruit extracts supported this observation.