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In vitro antioxidant activity, total phenolic and flavonoid contents of different solvent extracts of *Ficus racemosa* (Attikka) bark

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Ficus racemosa (Attikka) is widely used in Sri Lankan traditional medicine system for treatment of various diseases. The objective of the present study was to evaluate in vitro antioxidant activity of different solvent extracts obtained from the bark of *Ficus racemosa* grown in Sri Lanka. Two different crude extracts namely, 70% aqueous acetone and 80% aqueous methanol extracts were prepared by steeping method and subjected to quantitative analysis. The total phenolic and flavonoid contents were evaluated by Folin-Ciocalteu assay and aluminium chloride colorimetric method respectively. *In vitro* radical scavenging activity and antioxidant activity of the extracts were evaluated using 2,2-diphenyl-1-picrylhydrazyl (DPPH) assay and ferric-reducing antioxidant power (FRAP) assay. The results for the total phenolic contents were 5195.354 ± 132.942 (70% aqueous acetone) and 4414.158 ± 117.363 (80% aqueous methanol) mg Gallic acid equivalent/100 g dry weight (DW) of bark. Results of the total flavonoid contents were 8611.538 ± 87.521 (70% aqueous acetone) and 7592.864 ± 74.782 (80% aqueous methanol) mg Catechin equivalents /100 g DW of bark. The results of DPPH assay showed significantly high value (20.152 ± 0.646 mmol Trolox equivalents/100 g DW of bark) for 70% aqueous acetone extract compared to the value (18.562 ± 0.328 mmol Trolox equivalents/100 g DW of bark) obtained for the 80% aqueous methanol extract. Antioxidant activity by FRAP assay was 32.837 ± 1.557 (70% aqueous acetone) and 28.483 ± 0.395 (80% aqueous methanol) mmol Fe (II) equivalents/100 g DW of the bark. It is concluded that 70% aqueous acetone extract obtained from *F. racemosa* bark has significantly high values of total phenolic, flavonoid contents, antioxidant activity. Further studies should be carried out to isolate active compounds.

Keywords*:* Antioxidant activity, Flavonoids, *Ficus racemosa*, Phenolics

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