

## **CERTAIN PROPERTIES FOR ANALYTIC FUNCTIONS DEFINED BY A GENERALISED DERIVATIVE OPERATOR**

(Sifat Tertentu bagi Fungsi Analisis yang Ditakrif oleh Pengoperasi Terbitan Teritlak)

AISHA AHMED AMER & MASLINA DARUS

### *ABSTRACT*

In this paper, some important properties of analytic functions with negative coefficients defined by a generalised derivative operator are investigated. The properties include the necessary and sufficient conditions, radius of starlikeness, convexity and close-to-convexity.

*Keywords:* derivative operator; radius of starlikeness; convexity; close-to-convexity

### *ABSTRAK*

Dalam makalah ini dikaji beberapa sifat penting bagi fungsi analisis berpekali negatif yang ditakrif oleh pengoperasi terbitan teritlak. Sifat tersebut termasuklah syarat perlu dan cukup, jejari kebakbintangan, kecembungan dan dekat-dengan-kecembungan.

*Kata kunci:* pengoperasi terbitan; jejari kebakbintangan; kecembungan; dekat-dengan-kecembungan

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*School of Mathematical Sciences  
Faculty of Science and Technology  
Universiti Kebangsaan Malaysia  
43600 UKM Bangi  
Selangor DE, MALAYSIA  
E-mail: eamer\_80@yahoo.com, maslina@ukm.my\**

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\* Corresponding author