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**Daniel A. Nicks**

**Rational Deficient Functions of Derivatives of Mappings in the Classes  $S$  and  $B$**

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**Abstract.** Let  $f$  be transcendental and meromorphic in the plane of finite lower order with a bounded set of finite critical and asymptotic values. It is shown that a rational deficient function of any derivative of  $f$  is zero at infinity. On the other hand, if  $f$  has arbitrary order and a finite set of critical and asymptotic values, then any rational deficient function of  $f'$  must have a multiple zero at infinity. Furthermore, if such  $f$  has finite lower order then  $f'$  admits no rational deficient functions other than 0.

**Keywords.** Meromorphic function, Nevanlinna deficiency, singularities, inverse function.

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