Erratum

BY S. L. SEGAL

Mr K. A. Jukes has kindly pointed out that on page 398 line 21 and page 400 line 12 of my paper 'Summability by Dirichlet Convolutions', this journal 63 (1967), 393-400, Theorem 56 of Hardy and Riesz, *The general theory of Dirichlet series*, is misquoted.

Thus Theorems 4 and 6 of the cited paper are not proved (though they may perhaps be true).

With respect to Theorem 4, the argument of the paper, on omission of the erroneous quotation, establishes the following result:

THEOREM 4 (corrected). If $\sum a_n$ is a series such that $\sum_{d|n} a_d h(n/d)$ is (C, m)-summable for some $m \ge 1$, then either $\sum a_n$ is not $(\mathcal{D}, h(n))$ -summable or else its $(\mathcal{D}, h(n))$ -sum is 0.

Theorem 6 as it stands must be dropped altogether; however, the remarks following it are still valid, so that we have the following:

THEOREM. If $(\mathcal{D}, h(n))$ is a strong method with

$$\sum_{n \leqslant x} h^*(n) = o(1) \quad and \quad \sum_{n \leqslant x} n |h^*(n)| = O(x),$$

then the series Σa_n , where $a_n = \sum_{d \mid n} (-1)^{n/d} h^*(d)$

is $(\mathcal{D}, h(n))$ -bounded and (C, 1)-summable, but not $(\mathcal{D}, h(n))$ -summable.

Finally, Mr Jukes has observed that despite the dubiousness of Theorem 4 as stated originally, the corollaries thereto remain valid. He will also publish shortly a paper in which he shows how to construct two convergent series whose ordinary Dirichlet product is not (C, 1)-summable, thus providing a counter-example to the cited misquotation.