

Problem 20

In each of Problems 19 and 20, verify the given equation.

$$\sum_{k=0}^{\infty} a_{k+1}x^k + \sum_{k=0}^{\infty} a_kx^{k+1} = a_1 + \sum_{k=1}^{\infty} (a_{k+1} + a_{k-1})x^k$$