RUDIMENTARY ALGEBRA.

CHAPTER I.

DEFINITIONS.

1. We learn by Arithmetic how to calculate with numbers. Algebra teaches us how to perform calculations by means of the letters of the alphabet.

2. Numbers possess a particular and a relative value, while letters have no value in particular or in relation to one another. Since then letters possess no particular value, if we can perform calculations with them the results obtained will admit of general application. For if, calculating with letters, we arrive at a certain result, our calculation will apply to any value we may assign to the letters. For example, we shall presently see that if we multiply the difference between a and b by the sum of a and b, the product is equal to the difference between the square of a and the square of b. Now, as we may use a and b to represent any quantities we choose, we have, by a simple algebraical operation, arrived at a