

Abstract

A self-contained postage meter does not have a base separable from a main body. The single secure housing contains everything that would be in the main body of a prior art postage meter and everything that would be in a prior art meter base. Despite containing all these things, the single secure housing is small enough and light enough in weight to permit the entire meter to be readily transported to the post office for inspection or resetting. Within the single secure housing are the print rotor with value wheels, all the mechanisms for setting the print wheels, the descending and/or ascending register and associated microprocessor, and all the mechanisms for transport of the mail piece through the meter. Only a handful of controlled elements are required, chiefly a single inexpensive DC motor for franking and value wheel setting and a few electromagnets. Two one-way clutches are used so that rotation of the motor in one direction accomplishes a setting cycle for the value wheels and rotation of the motor in the other direction accomplishes a printing (franking) cycle. The setting cycle uses a four-bar linkage to rotate a setting axle in one direction and in the other direction. Clutches on the setting axle permit selective transmission of setting movement to the value wheels, mediated by pawls which are controlled by electromagnets. Power consumption is small and the meter is reliable. Despite the relatively low bulk and parts count the design satisfies simultaneously the demands of the postal authorities and the needs of the users.

This Sheet Has Been Replaced

