

ABSTRACT

LENGTHENED ALL-PLASTIC SELF-LOCKING PUMP

Disclosed is a lengthened all-plastic self-locking pump, including a bottle locking cap capable of being fixed on a liquid containing bottle, where a pump body and a locking cap capable of fixing the pump body on the bottle locking cap are provided on the bottle locking cap; a liquid storage chamber, a communication port communicated with the liquid storage chamber, a one-way valve capable of controlling the communication port to open, a pump rod capable of relatively sliding up and down and having an upper end penetrating out of the locking cap, and a piston sheathing on the pump rod and driven by the pump rod are provided in the pump body; the piston is sealingly inserted into the liquid storage chamber so that a pressure chamber is formed below the piston in the liquid storage chamber; when the piston moves upwards, a negative pressure is formed in the pressure chamber so that the one-way valve opens to make the liquid enter the pressure chamber; the upper end of the pump rod is provided with a pressing head capable of driving the pump rod downwards so that the piston squeezes the liquid in the liquid storage chamber downwards to flow out, and a lower end of the pump rod is provided with a connecting head penetrating downwards out of the piston and extending into the pressure chamber; a plastic spring having one end connected to the connecting head and capable of elastically pressing the pump rod to reset upwards is provided in the pressure chamber, and the plastic spring includes a plurality of elastic units connected from top to bottom.

(Fig. 1)