



An average E-pay system versus the TokenTap

System

Mechanical	Digital
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General

Simple & robust. Low tech. All complexity removed. When electronic tracker fails water dispensing is fully operational. No electronic power needed to perform main functionality (water dispensing)

High tech - electronic failure can result in downtime. Solar panels or other form of electricity needed to perform main functionality (water dispensing)

Suitable for:

Community managed systems and professional service models

Professional service provision model (at scale)

Dispensed volume

Fixed (1 jerrycan)	Variable
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Payment

Cheap (plastic or INOX) tokens	Expensive RFID tags
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Data logging

Transactions of water sales & volume with timestamps are logged

Data transfer

Via bluetooth and telephone;
No local internet connection needed.

Via internet - local internet connection needed

Data display

Data updates & overviews are sent to email address without costs

Dashboard - often with additional subscription costs

Life cycle cost

(~yearly depreciation + maintenance cost - site specific travel cost)

Aimed at: < USD 150 / yr

Depending on brand and set-up: ca. USD 350 > 600 /yr

Installation

Simple: only pipe of water system needs to be connected.

Can be complex - including installation of electronic connections, charge controllers, solar panels, batteries, calibration and programming settings like water price. Complexity differs amongst different alternatives.

Maintenance

Low cost: only spare parts at minor cost and no external party needed. Maintenance can be done by local mechanics and with low frequency.

Costly: expensive spare parts, more frequent downtime and often third party dependency (incl. travel and personel cost of provider)

Weight and dimensions

20 kg including dispensing unit and tap, plus tracker. 70x70x40cm

2/3 kg excluding dispensing unit and tap (depending on supplier and brand). Ca 20x20x40cm