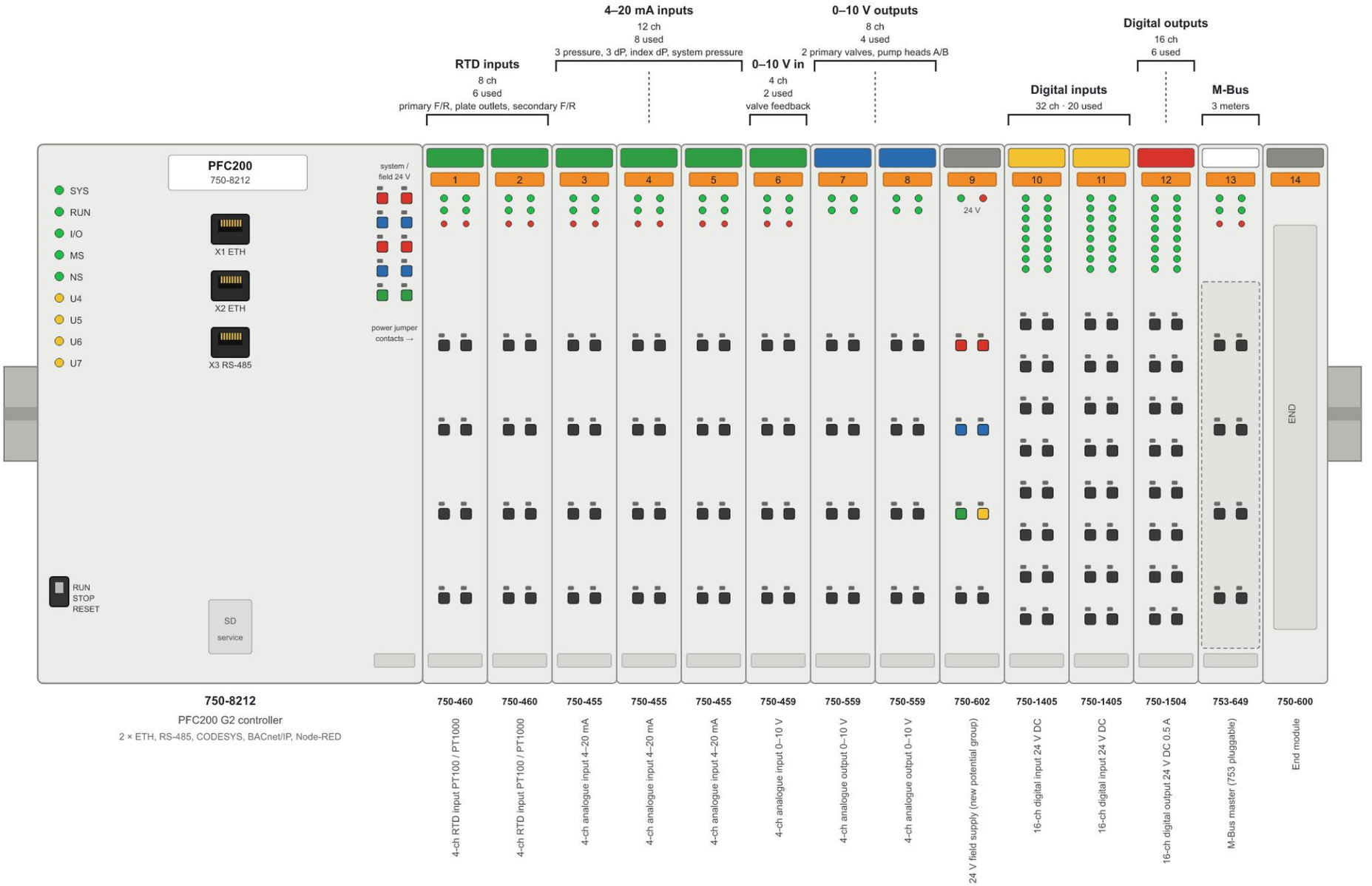
Standard substation element — WAGO 750 wiring centre

Twin-plate substation with twin-head distribution pump and pressurisation unit · one node per substation element · indicative front view · 8 November 2026

Module faces are stylised. Part numbers, widths and slice order to be confirmed with WAGO before ordering.



Rail length ≈ 240 mm (15 modules: controller 71.5 mm + 14 × 12 mm slices) · module height 100 mm

Notes

- Digital inputs: pump heads A/B run and fault, pressurisation unit (PU) fault, low and high pressure, high limit, flood, door, water meter pulse, filter dP, secondary isolation valve end switches (open and closed, per plate), selector Hand feedback, safety circuit healthy.
- Digital outputs: pump head enables, PU enable, two spring-return secondary isolation valves with end switches, alarm. 0–10 V: the primary control valves take a demand and return a position; the secondary valves and the primary dP valve have no 0–10 V. M-Bus: intake meter, offtake meter, cold-water meter.
- Twin-head variable-speed distribution pump, duty/standby: each head gives run and fault contacts and takes an enable and a 0–10 V speed. On Modbus RTU from the controller's RS-485 port instead, the speed outputs and run/fault inputs are freed and power and flow readings come for nothing.
- Pressurisation unit: fault, low-pressure and high-pressure contacts, an enable, and system pressure on 4–20 mA if the unit does not report it on Modbus. Its cold-water meter is the water-consumption monitoring point, on M-Bus or as a pulse input.
- The heat meter on the primary return is the intake boundary meter; its own Tf and Tr probes are read over M-Bus, not duplicated on the RTD card. A single-plate station is the same node with fewer channels used.

Latch colour code

Analogue input (green) · Analogue output (blue) · Digital input (yellow) · Digital output (red) · Communication / special (white) · Field supply / end module (grey)