

# 1" Medium Commercial Control Zone Kit

## with Pressure Regulating Basket Filter



Model: XCZ-100-PRB-MC

### Applications

Rain Bird's 1" Medium Commercial Control Zone Kit is built with Rain Bird's PEB valve and pressure regulating basket filter, this control zone kit ensures filtered, even water flow in low-volume irrigation zones. Its superior performance has been tested in commercial environments.

### Features

#### Long Life

- Trouble-free performance—even under harsh conditions. Constructed of heavy-duty glass-filled nylon, this valve resists clogging.

#### Low-Flow Capability

- Useful in a wide range of applications

#### Pressure Regulating Basket Filter

- Ensures clean, even water in low-volume irrigation zones

### Operating Range

- **Flow:** 3.0 to 20.0 gpm (11,4 to 75,7 l/m)
- **Inlet Pressure:** 15 to 150 psi (1,0 to 10,3 bar)
- **Outlet Pressure:** Regulated at 40 psi (2,7 bar)
- **Water Temperature:** 33°F (0,5°C) to 110°F (43°C)
- **Ambient Temperature:** 33°F (0,5°C) to 125°F (52°C)
- **Filtration:** 200 mesh (75 micron)\*

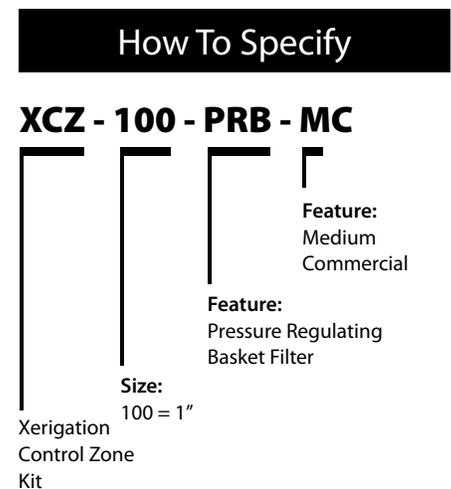
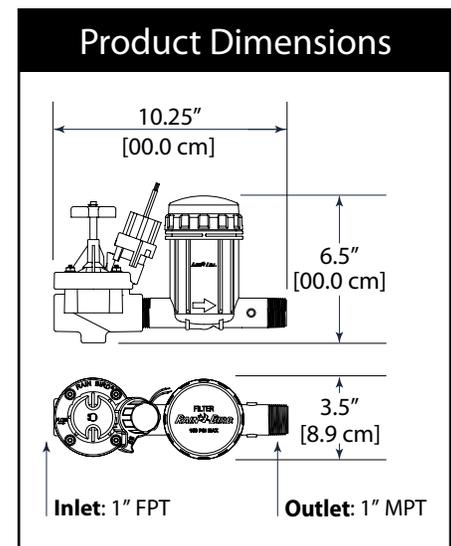
\*Also compatible with 100 or 120 mesh Rain Bird filter, available separately.

#### Filter Models:

100 Mesh (RED): QKCHK-100M  
200 Mesh (WHITE): QKCHK-200M

### Electrical Specifications

- Power: 24V AC, 50/60 Hz solenoid
- Inrush current: 0.41 A (9.84) at 60 Hz
- Holding current: 0.28 A (6.72) at 60 Hz
- Coil resistance: 30-39 Ohms



**Weblink to Control Zone Kits**

<http://www.rainbird.com/CZK>

## Specifications

Control zone kit shall be Rain Bird's 1" Medium Commercial Control Zone Kit with Pressure Regulating Basket Filter. It shall contain a 1" automatic irrigation control valve and a pressure regulating basket filter. The electric remote control valve shall be a normally closed 24V AC 50/60 Hz (cycles/sec) solenoid actuated globe/angle pattern design. The system pressure rating shall not be less than 150 psi (10,35 bar) and shall be capable of flow rates of 3.0 to 20 gpm (11,4 to 75,7 l/m).

The valve shall have manual open/close control (internal bleed) for manual opening and closing of the valve without electrically energizing the solenoid. The valve's internal bleed shall prevent flooding of the valve box.

The valve shall house a fully-encapsulated, one-piece solenoid. The solenoid shall have a captured plunger with a removable retainer for easy servicing, and a leverage handle for easy turning. This 24 V AC 50/60 Hz solenoid shall open with 19.6 V AC minimum at 150 psi (10,35 bar). At 24 V AC, average inrush current shall not exceed 0.41 amps. Average holding current shall not exceed 0.28 amps.

The valve shall have a flow control stem for accurate manual regulation and/or shut off of the outlet flow. The valve must open or close in less than 1 minute at 150 psi (10,35 bar), and less than 30 seconds at 20 psi (1,38). The valve construction shall provide for all internal parts to be removable from the top of the valve without disturbing the valve installation. The body shall have a removable o-ringed plug for installation in either globe or angle configuration.

The PR Basket Filter shall contain a 200 mesh (75 micron), stainless steel filter and a built-in 40 psi (2,8 bar) pressure regulator. The body of the filter shall be constructed of impact resistant glass-filled polypropylene and the cap of glass-filled nylon.

## Pressure Loss Chart

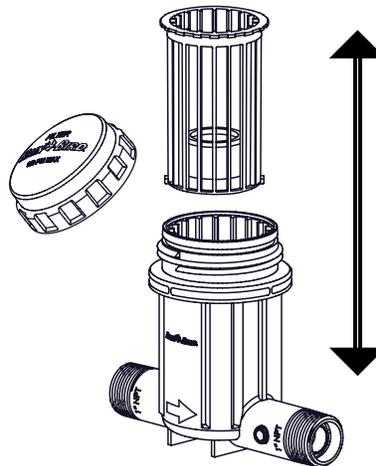
In order to supply 40 psi (2.8 bars) outlet pressure, additional pressure is needed at the inlet since there is some pressure loss from water flowing through the kit. The amount of pressure loss depends on the flowrate.

The charts below list the minimum inlet pressure required to supply 40 psi (2.8 bars) of outlet pressure.

### METRIC

Minimum Inlet Pressure for 40 psi Outlet Pressure	
Flow (gpm)	Inlet Pressure (psi)
5	45
10	49
15	57
20	-

Minimum Inlet Pressure for 2.8 bar Outlet Pressure	
Flow (l/m)	Inlet Pressure (bar)
18.9	3.1
37.9	3.4
56.8	3.9
75.7	-



Filter element is accessed vertically, making maintenance fast and easy, and ensuring dirt won't fall back into the line during cleanup operations

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