

# CONTRONiK

Multifunctional Gas Control System





## Contents

Manual Controls	5-7
Solenoid Controls	8
Combination Gas Controls-Fixed Regulator	11-12
Combination Gas Controls-Manual Modulation	13-14
Combination Gas Controls-Electrical Modulation	15-17
Combination Gas Controls-Air/Gas Modulation	17
Technical Specifications	18

## CONTRONIK

KUPO CO., LTD. was established in 1979 with its head office and manufacturing location in Taiwan. For many years, we devote ourselves to designing and specializing in the manufacturing of various gas valves, control systems and accessories.

The business objective of KUPO group is to extend and strengthen the market presence in the area of gas appliance in the Europe, America, Oceania and Asia market.

KUPO's equipment and facility for safety, control and regulation are suitable for number of applications: barbecues, fireplaces, furnaces, space heaters, water heaters, tumble dryers, domestic cooking range and boilers.

We, KUPO, dedicate ourselves to innovate, reform and advance. Always for its fine service to provide high quality product with competitive cost and better after-sales service that add value to all of our customers. We invite you to join us and set the pace for the future together.

Quality Management System Certification ISO 9001: 2008  
Laboratory Accredited Certification : ISO/IEC 17025: 2005











To make entertaining seem easy with **Contronik** gas control assembling in your **BBQ** or **Stove**.  
Few minutes later to create something special  
When delicious food is well presented,  
enjoying it with your family or guests day and night



# Manual Controls

These products range are operated with rotary knob with pilot outlet.

These controls are suitable for the appliances as barbecue, domestic cooking range, fireplace and oven with lower power consumption.

Multiple inlet & outlet mounting angle and diameter are available.

CV 700



CV 701



CV 710  
CV 711



## CV 700 Series

Features :

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop):

Single Outlet: 12,500 BTU/hr

Operating Temperature: -18°C~180°C

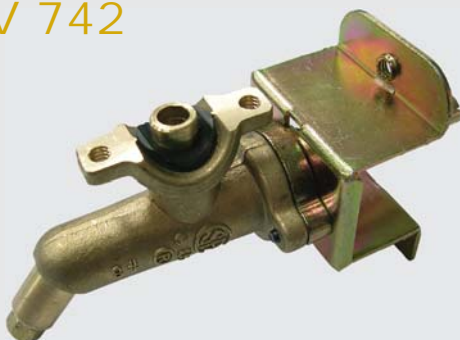
Customization:

Inlet & Outlet Diameter/ Rotation Diagram

CV 740



CV 742



Model No.	Angle	Inlet Diameter
CV 700	0°	16mm Pipe Clamp
CV 700C	0°	19mm Pipe Clamp
CV 700D	0°	22mm Pipe Clamp
CV 740	30°	16mm Pipe Clamp
CV 740C	30°	19mm Pipe Clamp
CV 740D	30°	22mm Pipe Clamp
CV 742	45°	16mm Pipe Clamp
CV 742C	45°	19mm Pipe Clamp
CV 742D	45°	22mm Pipe Clamp
CV 701	0°	1/8" NPT
CV 710	45°	1/8" NPT
CV 711		



## CV 670B

### Features :

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop):

Single Outlet: 12,000 BTU/hr

Double Outlet: 10,000 BTU/hr (Each Outlet)

Triple Outlet: 10,000 BTU/hr (Each Outlet)

Operating Temperature: -23°C~120°C

Customization:

Optional Piezo Ignition/ Spindle Length

Inlet & Outlet Diameter/ Rotation Diagram



## CV 680I

### Features :

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop):

90,000 BTU/hr

Operating Temperature: -40°C~90°C

Customization:

Optional Piezo Ignition/ Spindle Length

Inlet & Outlet Diameter/ Rotation Diagram



## CV 880A

### Features :

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop):

Single Outlet: 17,000 BTU/hr

Operating Temperature: -18°C~180°C

Customization:

Optional Piezo Ignition/ Spindle Length

Inlet & Outlet Diameter/ Rotation Diagram

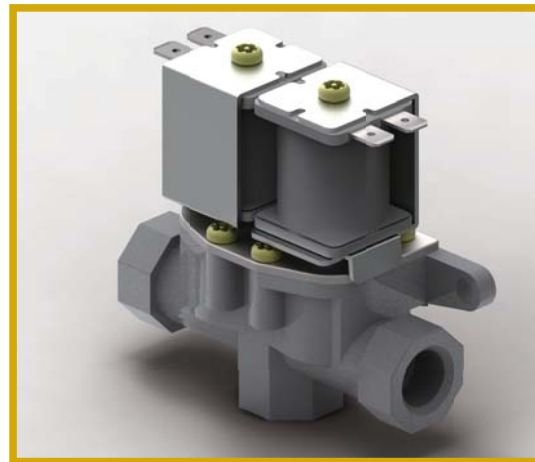


# Solenoid Controls

Solenoid gas controls with shut-off valve, normally Open and normally Drop-off with Hold optional, ranges of operation AC/DC voltage available controlling the main gas flow.

Valve body inlet and outlet thread connection: female thread, or flange connections.

## CV 910 & CV 912



### Features :

Magnetically operated, normally closed

Instantaneous operate when electric power energize  $\leq 1$  sec

When electric power failure, valve closes  $\leq 1$  sec

Mounting in any position, in pipe or on bracket

Maximum Inlet Pressure: 35 mbar ~ 50 mbar

Flow Capacity (1" W.C. Pressure Drop):

Single Outlet: 65,000 BTU/hr

Double Outlet: 65,000 BTU/hr (Each Outlet)

Operating Temperature: 0°C~145°C

### Customization:

Solenoid coil operation AC/DC voltage

Gas inlet and outlet thread dimension

CV 910 - Single Inlet & Outlet

CV 912 - Single Inlet, Double Outlet

A **Fireplace** is not only for decoration,  
but also about so much more to provide heat for your home.  
Relying on **Contronik** gas control  
your home will soon be warming up,  
and you will not be shivering with cold.







To provide both central heating and hot water to your home,  
Selecting **Contronik** gas control  
meets both your **Heating** and domestic **Water Heater** for sure,  
enable you to have instant hot water for washing and showers,  
heating providing for your **Radiators** in the meanwhile.

# Fixed Regulator

Combination gas controls with fixed pressure regulator perform ON-OFF controlling the main gas flow. Types of pilot, include manual valve single operating knob (OFF, Pilot, ON), or automatic shut-off valve supplied by thermopile/thermocouple or by external electric power.

Valve body inlet and outlet thread connection: male thread, female thread, or flange connections.

## CV 970AM & CV 970AA



### Features :

Include manual valve single operating knob (OFF, Pilot, ON) and fixed pressure regulator.

Require the use of thermopile/thermocouple which heated by the pilot burner flame, provides the electric power to operate the combination gas control.

Safety shut-off on pilot flame failure

Pilot outlet flow adjustment

Burner outlet pressure adjustment

Outlet Pressure Adjustment Range: NG 2"~5" W.C.

LPG 9"~12" W.C.

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop): 40,000 BTU/hr

Operating Temperature: -23°C~80°C

CV 970AM - ON-OFF operation

CV 970AA - Solenoid operated pilot valve and burner valve by normal control or through remote handset for flame ignition



## CV 931A

### Features :

Two automatic solenoid shut-off valves with fixed pressure regulator on the second automatic valve for ON-OFF operation.

Solenoid operated pilot valve and burner valve by normal control or through remote handset for flame ignition.

Pilot outlet flow adjustment

Main outlet pressure adjustment

Outlet Pressure Adjustment Range: NG 1.7"~3.5" W.C.  
LPG 5.5"~10" W.C.

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop): NG: 40,000 BTU/hr  
LPG: 62,000 BTU/hr

Operating Temperature: -40°C~80°C



## CV 935A

### Features :

Combination gas control include a manual valve for safety shut-off.

Two automatic solenoid shut-off valves with fixed pressure regulator on the second automatic valve for ON-OFF operation.

Solenoid operated pilot valve and burner valve by normal control or through remote handset for flame ignition.

Pilot outlet flow adjustment

Main outlet pressure adjustment

Outlet Pressure Adjustment Range: NG 1.7"~3.5" W.C.  
LPG 5.5"~10" W.C.

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop): NG: 150,000 BTU/hr  
LPG: 230,000 BTU/hr

Operating Temperature: -40°C~80°C



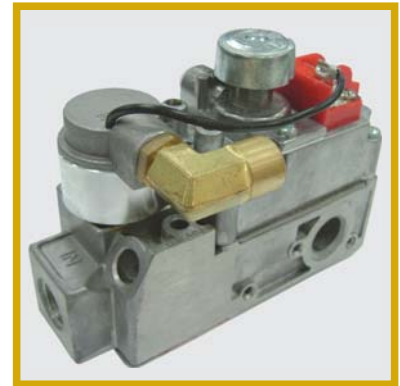
# Manual Modulation

Combination gas controls with operating knob (High-Low) controlling the main gas flow and manual adjustment of the outlet pressure.

Types of pilot, include manual valve single operating knob (OFF, Pilot, ON), or automatic shut-off valve supplied by thermopile/thermocouple or by external electric power.

Valve body inlet and outlet thread connection: male thread, female thread, or flange connections.

## CV 970BM & CV 970BA



### Features :

Include manual valve single operating knob (OFF, Pilot, ON) and operating knob (High-Low) modulation.

Require the use of thermopile/thermocouple which heated by the pilot burner flame, provides the electric power to operate the combination gas control.

Safety shut-off on pilot flame failure

Pilot outlet flow adjustment

Burner outlet pressure adjustment

Outlet Pressure Adjustment Range: NG 2"~5" W.C.

LPG 9"~12" W.C.

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop): 40,000 BTU/hr

Operating Temperature: -23°C~80°C

CV 970BM - High-Low modulation

CV 970BA - Solenoid operated pilot valve by normal control or through remote handset for flame ignition.

Manual control for burner valve with High-Low modulation.



## CV 931B

### Features :

Two automatic solenoid shut-off valves with operating knob (High-Low) modulation on the second automatic valve.

Solenoid operated pilot valve and burner valve by normal control or through remote handset for flame ignition.

Pilot outlet flow adjustment

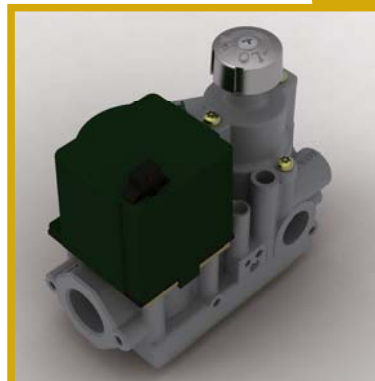
Main outlet pressure adjustment

Outlet Pressure Adjustment Range: NG 1.7"~3.5" W.C.  
LPG 5.5"~10" W.C.

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop): NG: 40,000 BTU/hr  
LPG: 62,000 BTU/hr

Operating Temperature: -40°C~80°C



## CV 935B

### Features :

Combination gas control include a manual valve for safety shut-off.

Two automatic solenoid shut-off valves with operating knob (High-Low) modulation on the second automatic valve.

Solenoid operated pilot valve and burner valve by normal control or through remote handset for flame ignition.

Pilot outlet flow adjustment

Main outlet pressure adjustment

Outlet Pressure Adjustment Range: NG 1.7"~3.5" W.C.  
LPG 5.5"~10" W.C.

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop): NG: 150,000 BTU/hr  
LPG: 230,000 BTU/hr

Operating Temperature: -40°C~80°C



# Electrical Modulation

Combination gas controls with stepping motor or proportional valve controlling the main gas flow and automatic adjustment of the outlet pressure.

Types of pilot, include manual valve single operating knob (OFF, Pilot, ON), or automatic shut-off valve supplied by external electric power.

Valve body inlet and outlet thread connection: male thread, female thread, or flange connections.



## CV 970H

Features :

Include manual valve single operating knob (OFF, Pilot, ON) and thermoelectric flame detection device.

ON-OFF thermostat and temperature setting knob for thermostatic function.

Fixed pressure regulator for ON-OFF operation

Pilot outlet flow adjustment

Burner outlet pressure adjustment

Outlet Pressure Adjustment Range: NG 2"~5" W.C.

LPG 9"~12" W.C.

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop): 40,000 BTU/hr

Operating Temperature: -23°C~80°C

Temperature Sensor Range: 15°C~38°C



## CV 6003C

Features :

Solenoid operated pilot valve and burner valve by normal control or through remote handset for flame ignition.

Diaphragm-operated second automatic valve opens under control of regulator; closes if gas or power supply is interrupted.

Fixed pressure regulator for ON-OFF operation or

Stepping Motor Pressure Regulator.

Pilot outlet flow adjustment

Burner outlet pressure adjustment

Outlet Pressure Adjustment Range: NG 1"~4" W.C.

LPG 4"~10" W.C.

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop): NG: 50,000 BTU/hr

LPG: 80,000 BTU/hr

Operating Temperature: -23°C~80°C



## CV 931C & CV 931D

### Features :

Two automatic solenoid shut-off valves with stepping motor or proportional valve modulation on the second automatic valve.

Solenoid operated pilot valve and burner valve by normal control or through remote handset for flame ignition.

Pilot outlet flow adjustment

Main outlet pressure adjustment

Outlet Pressure Adjustment Range: NG 1.7"~3.5" W.C.

LPG 5.5"~10" W.C.

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop): NG: 40,000 BTU/hr

LPG: 62,000 BTU/hr

Operating Temperature: -40°C~80°C

CV 931C - Stepping Motor Modulation

CV 931D - Proportional Valve Modulation



## CV 935C & CV 935D

### Features :

Combination gas control include a manual valve for safety shut-off.

Two automatic solenoid shut-off valves with stepping motor or proportional valve modulation on the second automatic valve.

Solenoid operated pilot valve and burner valve by normal control or through remote handset for flame ignition.

Pilot outlet flow adjustment

Main outlet pressure adjustment

Outlet Pressure Adjustment Range: NG 1.7"~3.5" W.C.

LPG 5.5"~10" W.C.

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop): NG: 150,000 BTU/hr

LPG: 230,000 BTU/hr

Operating Temperature: -40°C~80°C

CV 935C - Stepping Motor Modulation

CV 935D - Proportional Valve Modulation







## CV 983

Combination gas control include a ON-OFF switch for safety shut-off.

Solenoid operated safety valve and burner valve by normal control for flame ignition.

Two automatic solenoid shut-off valves with safety valve sequencing function for direct burner ignition operation.

Main outlet pressure adjustment

Outlet Pressure Adjustment Range: NG 2.5"~3.5" W.C.

LPG 8"~12" W.C.

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop): NG: 150,000 BTU/hr

LPG: 243,000 BTU/hr

Operating Temperature: -23°C~80°C

# Air/Gas Modulation

Combination gas controls with two automatic safety valves, control the gas flow to the air penumatically, by stepping motor or proportional valve are also available, to mix and modulate the air and gas in an adequate proportion.

Valve body inlet and outlet thread connection: male thread, female thread, or flange connections.



## CV 982

Features :

Two automatic shut-off valves

Offset level and Air Gas Ratio Modulation

Air Gas Adjuster(Optional)

Types of Modulation are available

CV 982C: Stepping Motor Modulation

CV 982D: Proportional Valve Modulation

Main outlet pressure adjustment

Outlet Pressure Adjustment Range: NG 1.7"~3.5" W.C.

LPG 5.5"~10" W.C.

Maximum Inlet Pressure: 35 mbar

Flow Capacity (1" W.C. Pressure Drop): NG: 120,000 BTU/hr

LPG: 190,000 BTU/hr

Operating Temperature: -20°C~70°C

# Technical Specifications

## Contronik Gas Control Application Form

	Barbecue	Domestic Cooking	Fireplace/ Stove/ Hearth	Furnace	Space Heater/ Radiator	Water Heater	Combi Boiler
CV 700 Series	●						
CV 670B	●		●				
CV 680I			●				
CV 880A	●		●				
CV 910 & CV 912		●					
CV 970 Series			●		●		
CV 931 Series			●		●	●	
CV 935 Series			●	●	●		
CV 982 Series			●	●	●	●	●
CV 983			●	●	●		

## Pressure Conversion Table

	bar	mbar	Mpa	kPa	psi
bar	1	1,000	0.1	100	14.5037
mbar	0.001	1	0.0001	0.1	0.0145
Mpa	10	10,000	1	1,000	145.037
kPa	0.01	10	0.001	1	0.145
psi	0.06895	68.95	0.006895	6.895	1



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