



# DATASHEET

EMERGENCY RELIEF MANHOLE COVER FOR BULK STORAGE TANKS

## CNC 121 / 122 Series

### Emergency Relief Manhole Cover



#### APPLICATION

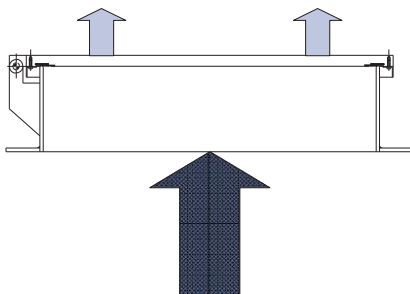
Motherwell Tank Protection (MTP) CNC121 and CNC122 non-sparking emergency relief manhole covers permit access to low pressure storage tanks and provide emergency venting capacity in the event of fire.

CNC121/122 series valves are used extensively on **bulk storage tanks**, including floating roof tanks, they are manufactured by MTP in our UK manufacturing plant to exacting quality standards and backed by over 50 year's experience. Sizes range from 10" (250mm) to 36" (900mm).

#### BENEFITS

- Hinged pallet can be manually lifted allowing access to the tank for cleaning and inspection with no gasket replacement or unbolting necessary.
- Range of **sizes and materials** to suit a wide range of applications
- Wide range of pressure settings to provide **maximum tank protection** whilst ensuring minimum gas loss
- Low cost maintenance.
- **FREE valve sizing** service assists optimum valve performance/cost specification.
- ATEX compliant to directive 2014/34/EU

#### PRINCIPLE OF OPERATION



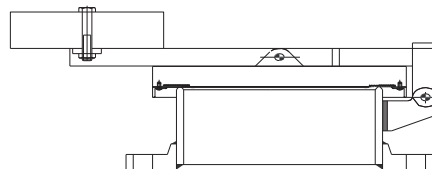
Emergency relief manways are fitted to storage tanks to allow emergency flow due to the excessive venting requirement from a fire burning around a storage tank. This eliminates a costly tank rupture, providing emergency venting from abnormal internal pressure beyond the capability of the pressure relief vent. In the event of a fire the pallet will lift at a predetermined pressure, thus supplying a large venting area.

The design of this model employs a PTFE insert affording a tight seal below set pressure between the pallet and the corrosion resistant seat.

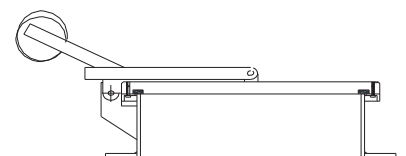
THE CNC122 model is fitted with an additional spring-loaded vacuum valve that will open under negative pressure to protect the tank from any vacuum condition damage that may occur.



Normal Settings



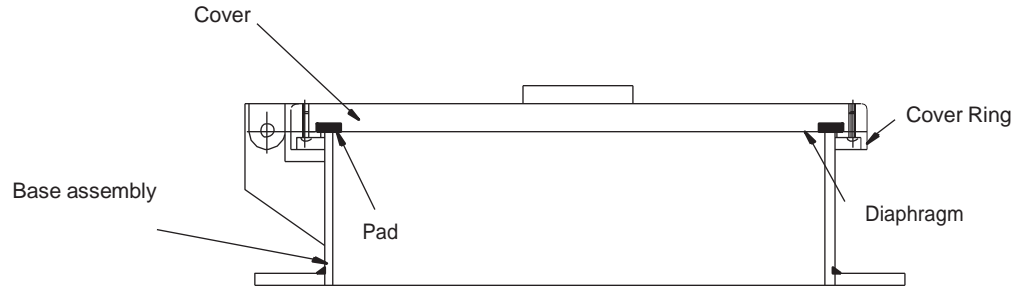
High Settings



Low Settings

# SPECIFICATION

## Emergency relief manway covers



### GENERAL DESCRIPTION

MTP Emergency Relief Manhole Cover

### APPLICATION

Bulk Storage Tanks, Low pressure gas pipeline systems, Digesters, Gas Holders

### PHYSICAL

Model	121 or 122
Sizes	10" 12" 18" 20" 24" 26" 28" 30" 32" 36"
Process Connection	1. API650 (20" and 24") 2. ANSI 150# 3. Special (Flange drilling as requested)
Materials	1. Aluminium 2. Carbon Steel 3. Stainless Steel 4. Special (Available upon request)
Diaphragm & Insert	1. PTFE 2. Special ( eg, EPDM, Viton , Cork, upon request)
Weight	1. Lead Plate (Standard) 2. Stainless Plate (Special)

### PROCESS

Pressure Settings	1.8"wg (4.5mbar) - 56"wg (140mbar)
Vacuum Settings (CNC122)	3.46"wg (9mbar) – 10"wg (25mbar)

### ORDERING CODE

MODEL-SIZE-MATERIAL-DIAPHRAGM & INSERT + P/V Settings  
e.g. **121-12-1311** (121 series, 12" API650 connection, carbon steel body, PTFE diaphragm and insert, lead weights)

### VALVE SIZING – FREE SERVICE

Computerised valve sizing to API 2000, contact us on the numbers below.

### AFTERSALESUPPORT

MTP provide comprehensive spares support, a **free valve inspection service** and term preventative maintenance schemes using product-trained technicians to service MTP and other brands of valves and fittings.

### Motherwell Tank Protection

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