

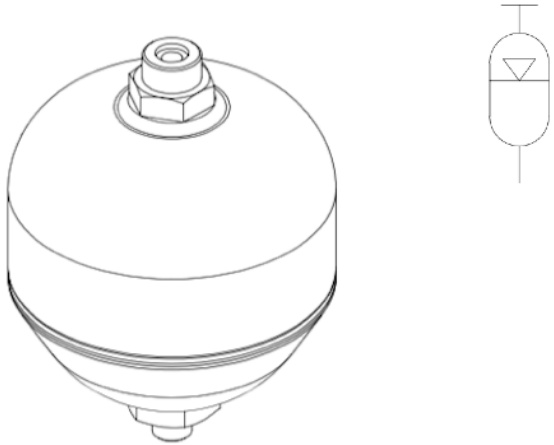
DIAPHRAGM ACCUMULATOR



Diaphragm Type | 140bar | Threaded

Specification/ Technical Data

| | |
|----------------------------|--------------------|
| Max. Operating Pressure | 140 bar |
| Max. Nitrogen Pressure | 60 bar |
| Min. N2 Pressure | $P_{max} \div 2.5$ |
| Max Flow | 15 lpm |
| Re-chargeable | Yes |
| Repairable | No |
| Body Material | Cast Steel |
| Media | Mineral Oil |
| Oil Temperature Range | +10 to 60°C |
| Oil Viscosity | ISO VG 46-100 |
| Oil Cleanliness (ISO 4406) | 20/18 /15 |
| Orientation | Any |
| Weight (approx.) | 3 - 4Kg |



FAD is a hydro-pneumatic accumulator used to store liquid under pressure. A flexible membrane or diaphragm is fitted into the body to separate the nitrogen and oil chambers. An inert gas like Nitrogen is charged into the port GA through a pressure valve to a pressure P0. As the diaphragm expands, it fills the complete volume of the accumulator body V0.

When connected to a hydraulic system with pressure P1, which is higher than P0, the oil now compresses the nitrogen and thereby reduces the gas volume to V1.

A potential energy is now stored in the accumulator to be utilised whenever needed to absorb shocks, stabilise flow, leakage compensation and reduce any vibrations in hydraulic systems and thus improve equipment performance.

Key Features:

- Energy efficient
- Fast response
- Light weight and compact dimensions
- Refillable gas port compatible with popular filling equipment
- Specially designed for machine tool applications

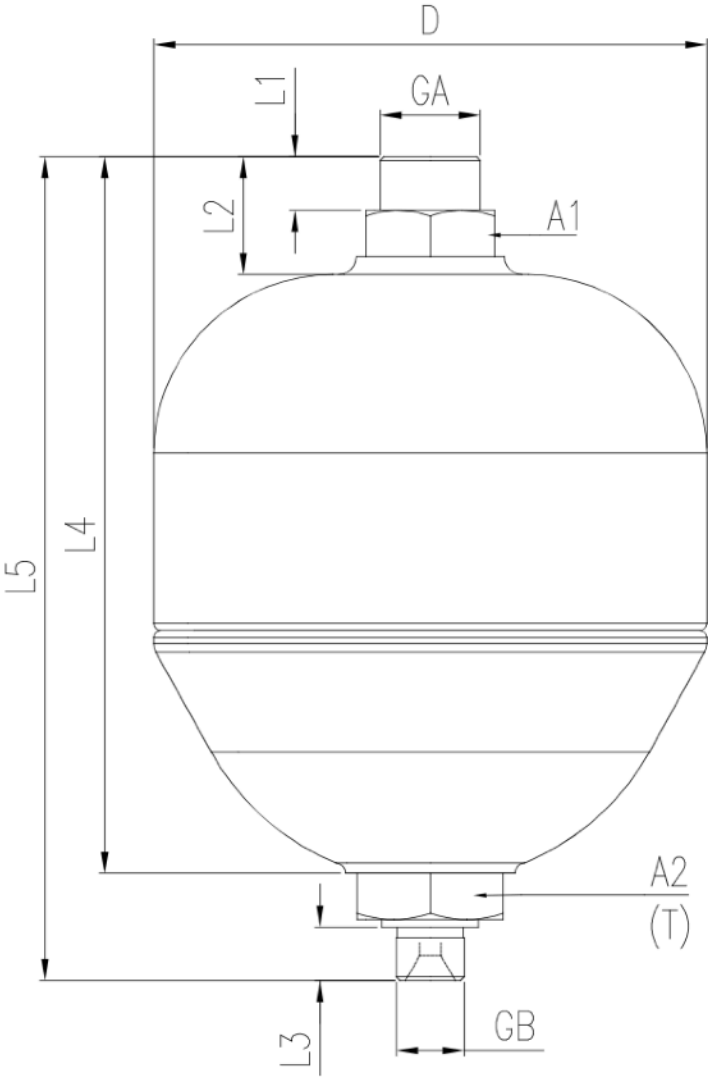
Note: Contact factory for higher pressures

Ordering Information

| Basic Code | Diaphragm Accumulator | FAD |
|---------------|-----------------------|----------|
| Capacity | 1.0 or 1.5ltr | 1.0/ 1.5 |
| Max Pressure | 100bar | 100 |
| Seal Material | Viton | No Code |
| Pre-Charge | Po | /20 |
| Version | | 1x |

Note: Nitrogen pressure will not be set unless specifically mentioned in the Purchase Order. Nitrogen Pressure can be set to a maximum of 60bar subject to application, accumulator limitations and requirements.

Dimensions



| Model Code | Nominal Size | Max. Flow (L/min) | Weight (kg) |
|------------|--------------|-------------------|-------------|
| FAD-1.0 | 1.0L | 15 | 5.0 |
| FAD-1.5 | 1.5L | 15 | 6.0 |

| Size | øD | L1 | L2 | L3 | L4 | L5 | GA | GB | A1 | A2 | Tightening Torque T (N-m) |
|------|-----|----|----|----|-----|-----|---------|----------|----|----|---------------------------|
| 1.0L | 140 | 15 | 33 | 12 | 185 | 210 | M18x1.5 | 1/2" BSP | 36 | 41 | 24 |
| 1.5L | 155 | 15 | 33 | 12 | 200 | 230 | M18x1.5 | 1/2" BSP | 36 | 41 | 24 |