



Access Hatches - Type MH-20

Part 1- General

1.1 Standards

- .1 Conform to CAN3-S157 Strength Design in Aluminum.
- .2 Conform to CSA W59.2 Welded Aluminum Construction and CSA W47.2 Certification of Companies for Fusion Welding of Aluminum.
- .3 Conform to OHBD Truck Wheel Load (100KN) in off-road location where not subject to high density traffic.

1.2 Quality Assurance

- .1 Welding shall only be undertaken by a company Certified by the Canadian Welding Bureau to the requirements of CSA Standard W47.2, Certification of Companies for the Fusion Welding of Aluminum.

1.3 Shop Drawings

- .1 Submit shop drawings in accordance with Section 01300 - Submittals.
- .2 Indicate materials, thicknesses, reinforcement, details and accessories.
- .3 Manufacturer shall supply installation drawings and instructions.
- .4 Manufacturer shall supply engineer's calculations proving reinforcement is adequate to meet H-20 wheel loading.

Part 2- Products

2.1 Materials

- .1 Aluminum Extruded Shapes: to CSA HA.5, Alloy 6061-T6.
- .2 Aluminum Tread Plate to CSA HA.5-M1980 Alloy 6061-T6.
- .3 Fasteners, gas spring, and hold open arms in 316 stainless steel.
- .4 Slam lock in 316 stainless steel.
- .5 Continuous hinges in 304 and 316 stainless steel.

2.2 Fabrication

- .1 Fabricate square, true, and accurate to required size, with joints closely fitted. Remove all burrs and sharp edges.
- .2 Ensure hinges are vandal proof - secure bolts with nylon insert lock nuts.

2.2 Fabrication (continued)

- .3 Countersink all fasteners - ensure hatch is flush.



- .4 Paint all surfaces coming in contact with concrete with one thick coat of bituminous paint.

2.3 Access Hatches

- .1 Provide the appropriate frames and covers to the dimensions on the Contract Drawings. Ensure all covers are:
 - .a hinged with continuous piano hinges,
 - .b framed with a drain channel complete with perimeter anchor flange, 1 1/2" drainage coupling and neoprene sealing gasket,
 - .c provided with a slam lock, sealing plug and removable opening handle,
 - .d equipped a retractable lifting handle,
 - .e equipped with a gas spring for easy operation,
 - .f equipped with a hold open arm to restrain an open hatch in a vertical position,
 - .g equipped with tamper proof fasteners,
 - .h equipped with door leaf made of 6.35 or 9.5mm thick slip resistant diamond pattern plate, and
 - .i reinforced to withstand a live load of 16,000 pounds over and 8 x 20 inch area.

Part 3- Execution

3.1 Installation

- .1 Install access hatches where indicated on the contract drawings.