

# RAPTOR SHALLOW MOUNT RISING BOLLARD

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GB Patent Number GB2479722

European Patent Number  
EP2561140

US Design Patent Number US  
D715, 174 S

US Patent Number US 8, 979,  
419 B2



Heald's Raptor combines the high security of a roadblocker with the flexibility of a shallow mount bollard. Tested to both UK PAS68 and US ASTM standards, not only will it halt a 7.5 tonne truck travelling at 80 kph it will also continue to function following the impact.

As the Raptor was tested as a single unit, it can be used either as a standalone bollard or as part of an array to secure an opening of virtually any size. It has an extremely small footprint and is only 440 mm deep.

Raised and lowered remotely by a push button interface the Raptor is also available with Heald's Hydra control and monitoring system, which allows far more detailed interaction with the unit than any other system currently on the market. It can also be supplied with an EFO (Emergency Fast Operation) system where required.

## Installation and Integration

The Raptor requires an excavation depth of just 500 mm, with a single unit having a footprint of just 2500 mm x 1540 mm. It requires no precasting of the pit or additional rebar, ensuring the installation is as simple and efficient as possible.

The Raptor will also require the installation of a control cabinet, detection loops and ducting to allow the unit to function and communicate. Our fitters will ensure that everything is installed both to our extremely high standards and to your satisfaction.



*Due to a continuous program of development Heald reserve the right to change specifications at any time.*

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<b>Performance Rating</b>	ASTM: M50-P1 Zero Penetration (SD-STD2.01 K12) ASTM: C40 P1 Zero Penetration PAS68 Blocker/Bollard V/7500[N3]/80/90:3.3/18.9
<b>Axle Loadings</b>	Will withstand any road going vehicle (In-house test certificate). Axle weight 120 tonnes or more.
<b>Raised Height</b>	985 mm
<b>Width</b>	380 mm
<b>Composition</b>	Profiled steel plate Welding in accordance with BS 4872-1:1982 Manufacturing in accordance with BS 6571
<b>Motor</b>	Spec dependant on site requirements and may be altered after consultation with client. 3 kW motor. Immersed pump. Extra Heavy duty solenoid valves (24 V DC) for reliability in operation. Manual hand pump. 30 litre tank.
<b>Power</b>	415 V/3ph and neutral/50 Hz. Alternatively, power to suit customer requirements.
<b>PLC Control Voltage</b>	24 V DC
<b>Options</b>	Emergency Fast Operation (EFO) via accumulator Hydra remote control and monitoring Trace heating
<b>Normal Raise Speed</b>	6 seconds approx
<b>EFO Speed</b>	1.5 seconds approx
<b>Duty Cycle</b>	100% rated.
<b>Finish</b>	Galvanised then primed and painted grey or yellow, Chevrons available. Other colours available on request.
<b>Cabinet</b>	Cabinet size dependant on specific product and site requirements. Finished in white (alternative colours available on request).
<b>Sitework</b>	Unique design does not require steel reinforcement of concrete for fitting No pre-cast pit required. Various levels of installation service available. Please contact Heald for further details. Detailed drawings, technical guidance and full maintenance offered.

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