



REBLOC

PRECAST CONCRETE BARRIER SOLUTIONS

- ☎ 0115 983 2304
- ✉ sales@hardstaffbarriers.com
- 🌐 www.hardstaffbarriers.com

OUR COMPANY

Hardstaff Barriers is a multi-award winning manufacturer and supplier of protective roadside barriers and perimeter security systems.

Our roadside barriers, hostile vehicle mitigation (HVM) systems, perimeter fencing, concrete security barriers and access gates are designed for one reason: to keep people and property safe.

Our products are designed to offer the highest levels of protection and are delivered with expertise and excellence.

Hardstaff has installed safety barriers at royal weddings, state visits and across the UK's road network.

Our professional and experienced team is committed to providing an outstanding service.

OUR SERVICES

Our systems are designed to provide protection and redirect errant vehicles from hazards within or immediately adjacent to the highway.

Utilising our extensive in-house haulage and operations team capability, Hardstaff provides a complete nationwide service - from the supply to the transportation and installation of our concrete barrier product range.

This expertise, along with our reputation for innovation, development and reliability, has been instrumental in establishing and maintaining excellent customer relationships.

Our experienced team offers project design support to provide the best solution to help meet specific client needs.

CONTENTS

Free-standing Systems	4
Anchored Systems	14
Embedded Systems	25
Couplings & Special Elements	28
Product Name Guidance	29
Systems Overview	30
Performance Classes	31



REBLOC

FOR THE LOVE OF LIVES

The UK's roads are among the safest in the world thanks to the safety measures and interventions that have been put in place to protect drivers, pedestrians and workers. We're proud of the role we play in supplying critical safety infrastructure.

What is REBLOC?

A reliable vehicle restraint system (VRS) is an essential roadside feature, protecting lives by safely redirecting errant vehicles and preventing them from breaking through the barrier upon impact.

REBLOC is a precast concrete VRS designed to provide protection on high-speed roads and motorways.

The individual elements form a high strength continuous chain of barrier that provides high containment and safely absorbs energy and impact forces.

A wide range of REBLOC products are available, with a variety of working widths, lengths, weights, configurations and capabilities, making it the ideal choice for any highway scheme.

Safety wherever you need it

Available as temporary or permanent solutions, all REBLOC safety barriers have been comprehensively tested according to European Standard EN1317 with real-life crash tests.

Each product has been awarded a containment class, which confirms the product's ability to retain specified vehicles at determined speeds and impact angles, and a working width level, which is based on the width of the barrier plus the amount of deflection that occurs when the barrier is impacted.

For information on performance classes see page 31.

Advantages of using precast concrete barriers

- ✓ Managed risks
- ✓ Off site-manufacturing
- ✓ Factory production control
- ✓ Improved project planning
- ✓ Scheme delivery
- ✓ Rapid and planned installation
- ✓ Minimal plant movement on site
- ✓ No wet trades on site
- ✓ Reduced people plant interface
- ✓ Reduced weather risks (production and installation)
- ✓ Multiple quality processes before loading and delivered to site

NEW

REBLOC LC H1W1 BARRIER



Introducing the REBLOC LC (Low Carbon) RB80 XA H1W1 concrete barrier, engineered for reduced carbon emissions to support initiatives for achieving Net Zero.

The Low Carbon REBLOC RB80 XA H1 W1 Concrete Barrier is a carbon reduced variant of our existing RB80 XA products.

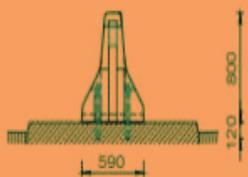
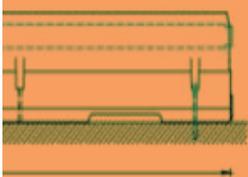
The new H1 RCB maintains the same dimensions and profile as our H2 W1 RCB, and the redesign employs less steel and concrete. Furthermore by transitioning to a lower carbon concrete mix, we've drastically cut the carbon emissions in manufacturing this barrier, which is crash tested to meet EN1317.

H1 and H2 REBLOC rigid concrete barriers share an identical external profile allowing for seamless connection between the two systems. This versatility provides a solution that can be delivered through the principles of construction excellence, utilising the correct performance VRS barrier to suit the site parameters. Both H1 and H2 REBLOC barriers can be supplied with low carbon concrete.



**COMPARING STANDARD RB80XA WITH LC RB80XA

BS EN 1317 TESTED AND APPROVED PRODUCT



FIND OUT MORE ABOUT
OUR EXISTING RB80XA
PRODUCT LINE:

PAGE 18





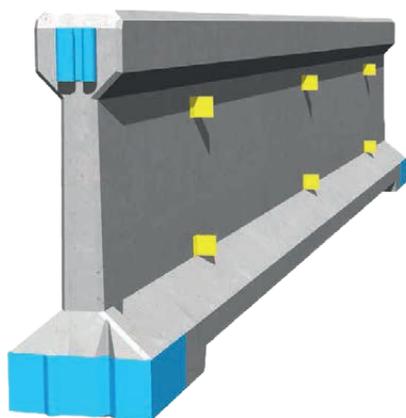
FREE-STANDING SYSTEMS

All REBLOC free-standing systems are available in different heights and containment levels and do not require any intermediate anchoring.

High containment levels with low working widths are achieved without the need for anchoring.

Features

- ✓ Modular systems with no intermediate anchors
- ✓ Fast and easy installation requiring minimal plant and labour
- ✓ Economic and efficient



REBLOC RB80SA_4

N2 W4

REBLOC RB80SA_12

N2 W3



REBLOC RB80SA_4 and RB80SA_12 are free-standing precast concrete vehicle restraint systems designed to provide protection on high-speed roads and motorways where space is limited.

Features

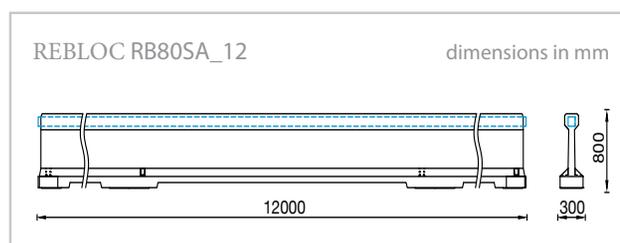
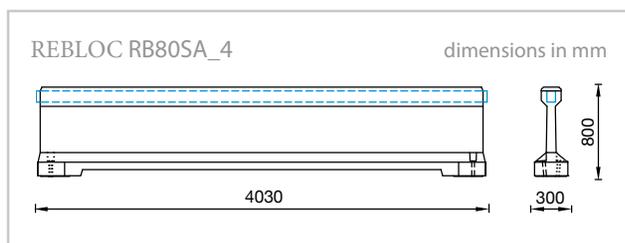
- ✓ Free-standing, no anchors along the run
- ✓ It has a width of just 300mm, making it ideal for narrow roads
- ✓ Integrated rubber pads available to protect the road surface
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users
- ✓ **W1 anchored option available. See page 16.**

RB80SA_4 Specifications

- » Weight: 1010kg
- » Dimensions(mm): 4030 x 300 x 800
- » Minimum installation: 92.7m

RB80SA_12 Specifications

- » Weight: 3000kg
- » Dimensions(mm): 12000 x 300 x 800





REBLOC RB80_8

H1

W4

N2

W3

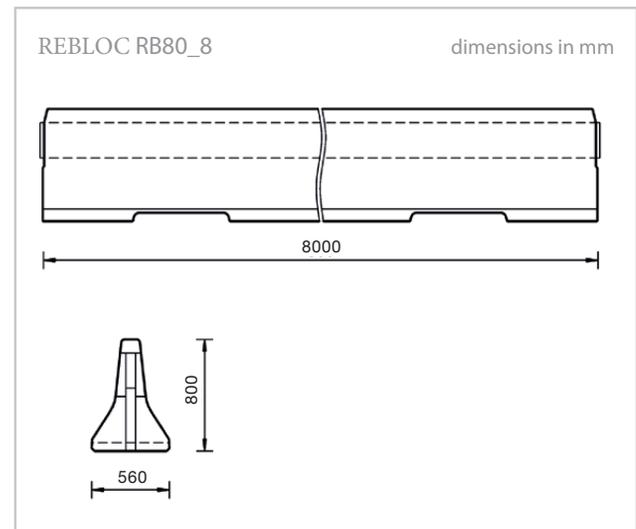
REBLOC RB80_8 is a free-standing precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways.

Features

- ✓ Free-standing
- ✓ Different fields of application
- ✓ Speedy and easy installation, relocation and removal
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Specifications

- » Weight: 4000kg
- » Dimensions(mm): 8000 x 560 x 800
- » Minimum installation: 112m



REBLOC RB80H_8

H2 W5 H1 W4

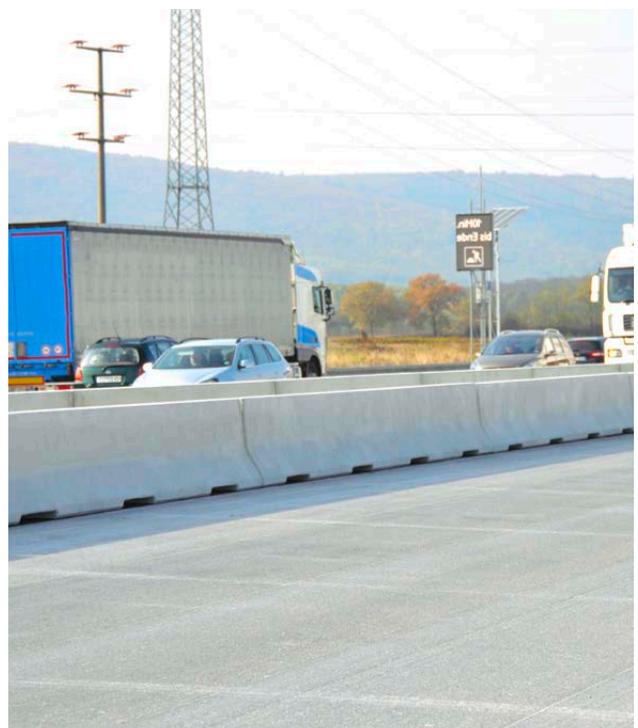
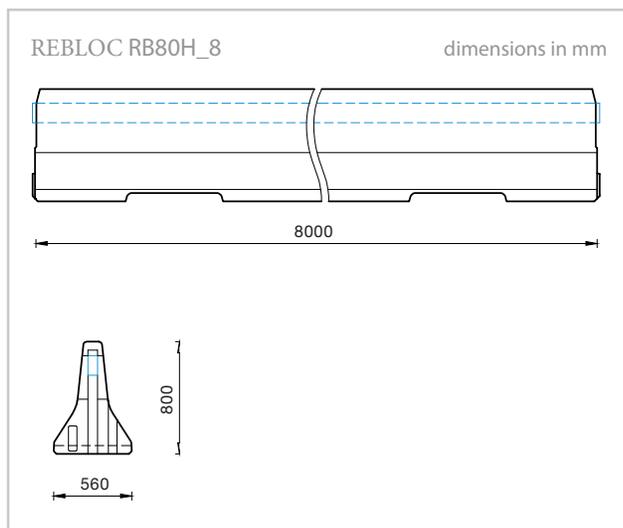
REBLOC RB80H_8 is a free-standing precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways.

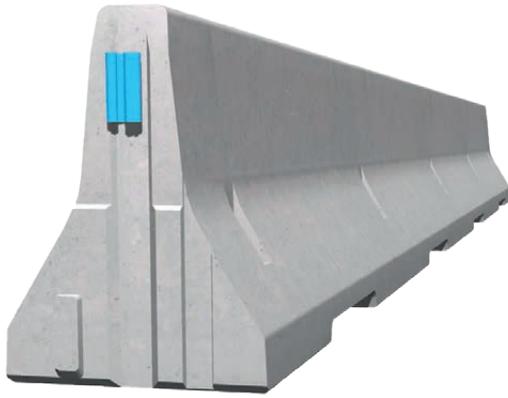
Features

- ✓ Free-standing
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Specifications

- » Weight: 4000kg
- » Dimensions(mm): 8000 x 560 x 800
- » Minimum installation: 80m





REBLOC RB80XAS_8

H2 W5

REBLOC RB80XAS_8 is a free-standing precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways.

Features

- ✓ Free-standing
- ✓ Barrier can be pinned into asphalt, concrete or compacted soil with no additional foundation required
- ✓ Universal coupling design is quick and easy to install
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users
- ✓ Anchored option also available. See page 18.

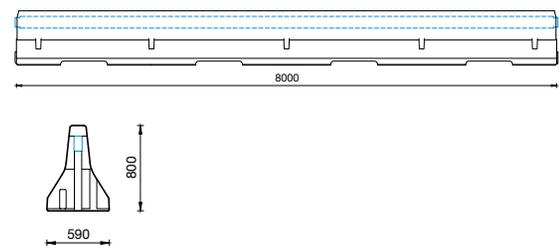
Specifications

- » Weight: 4800kg
- » Dimensions(mm): 8000 x 590 x 800
- » Minimum installation: 80m



REBLOC RB80XAS_8

dimensions in mm



REBLOC RB80XW_8

H2 W1

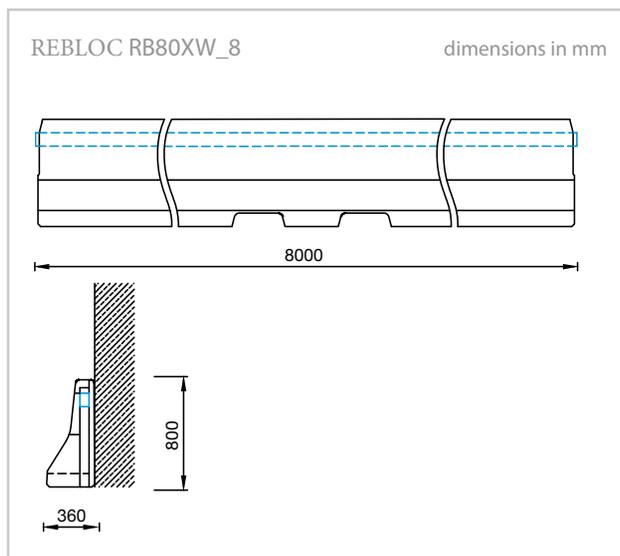
The REBLOC RB80XW_8 is a free-standing precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways, for the application along vertical tunnel walls.

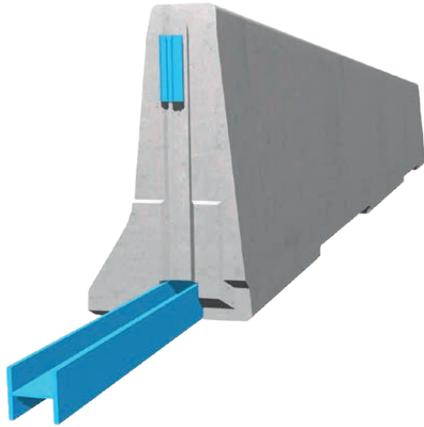
Features

- ✓ Free-standing
- ✓ Thanks to its asymmetric shape, it can be positioned seamlessly along existing tunnel walls
- ✓ Due to the low system width, valuable space is maintained and sufficient width of traffic lanes is ensured
- ✓ No anchorage necessary - free-standing system
- ✓ Low working width of W1
- ✓ Quick installation reduces duration of construction site
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Specifications

- » Weight: 3400kg
- » Dimensions(mm): 8000 x 360 x 800
- » Minimum installation: 32m





REBLOC RB100SFS_8

H2 W4

The REBLOC RB100SFS_8 is a free-standing precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways.

Features

- ✓ Free-standing
- ✓ High containment level (H2) with low system movement
- ✓ Ideal for use on bridge constructions
- ✓ Minimal collision forces transferred to the bridge deck due to the barrier being free-standing
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

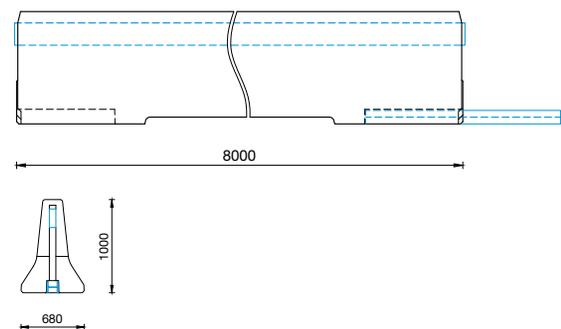
Specifications

- » Weight: 6750kg
- » Dimensions(mm): 8000 x 680 x 1000
- » Minimum installation: 96m



REBLOC RB100SFS_8

dimensions in mm



REBLOC RB100SFP_8

H2 W3

REBLOC RB100SF_8

H2 W3

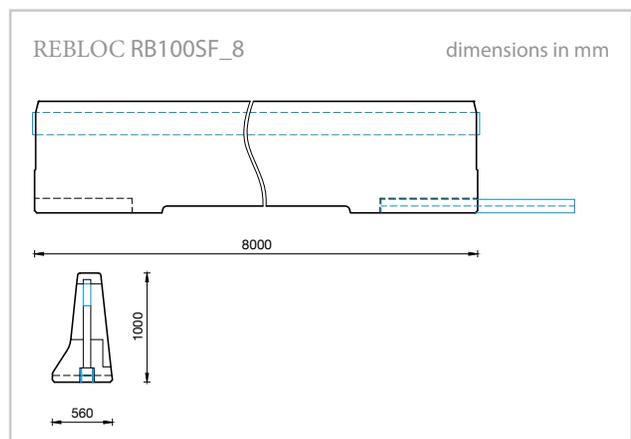
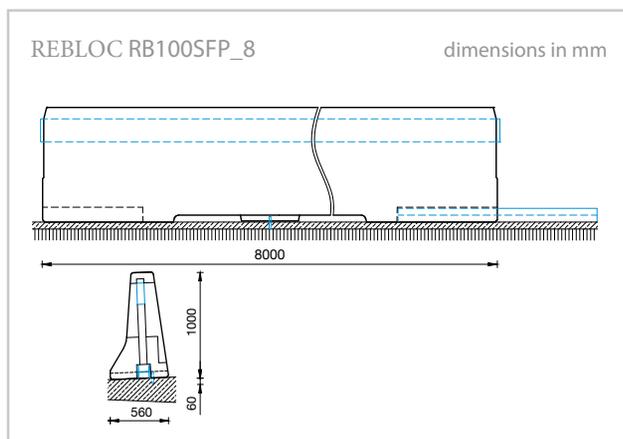
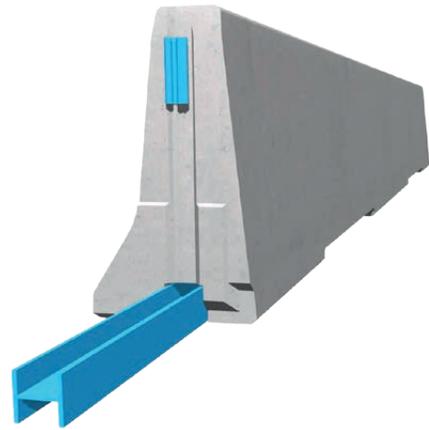
The REBLOC RB100SFP_8 and RB100SF_8 are free-standing precast concrete vehicle restraint systems designed to provide protection on high-speed roads and motorways.

Features

- ✓ Free-standing
- ✓ High containment level (H2) with low system movement
- ✓ Ideal for use on bridge constructions
- ✓ Minimal collision forces transferred to the bridge deck due to the barrier being free-standing
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

RB100SFP_8 & RB100SF_8 Specifications

- » Weight: 6000kg
- » Dimensions(mm): 8000 x 560 x 1000
- » Minimum installation: 96m





REBLOC RB140SFS_5.5

H4a W4

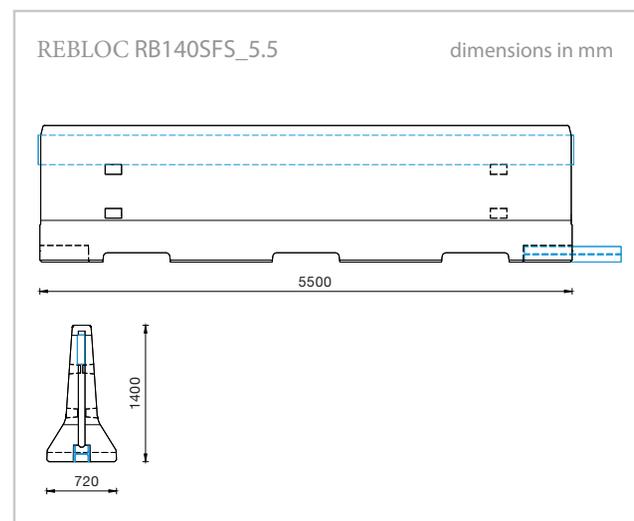
The REBLOC RB140SFS_5.5 is a free-standing precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways.

Features

- ✓ Free-standing
- ✓ Provides the highest containment level (H4a) and even restrains the impact of a 30-tonne lorry travelling at 65 km/h
- ✓ The height of this system offers effective glare protection
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Specifications

- » Weight: 6000kg
- » Dimensions(mm): 5500 x 720 x 1400
- » Minimum installation: 88m



REBLOC NOISE BARRIER NBL100X /200-450_5

H2 W4

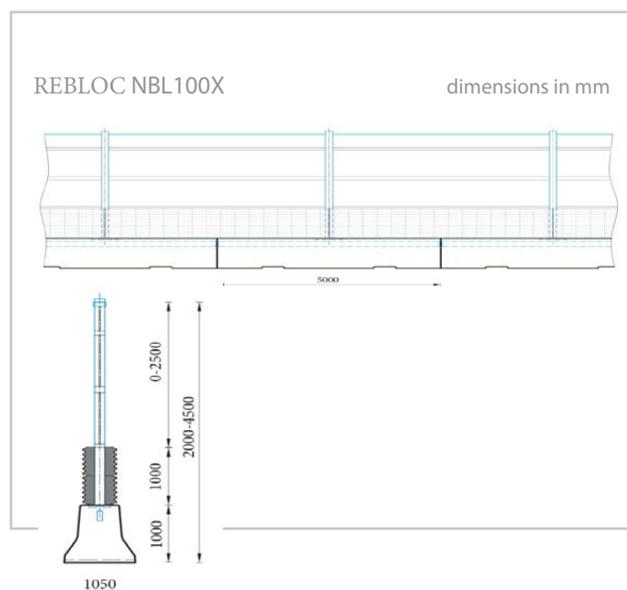
The REBLOC NBL100X/200-450_5 is a free-standing precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways.

Features

- ✓ Free-standing
- ✓ Combined product achieves safety and sound insulation in one
- ✓ Two in one product
- ✓ Product can be quickly and easily installed
- ✓ Various heights are available
- ✓ Wide variety of colours, designs and materials are available for customised layout options
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Specifications

- ›› Weight: 8000kg
- ›› Dimensions(mm): 5000 x 1050 x 1000
- ›› Minimum installation: 65m



Free-standing

Anchored

Embedded



ANCHORED SYSTEMS

REBLOC anchored barriers can be used as single-sided and double-sided systems for the central reserve and along the verge.

The system is installed on concrete, asphalt or compacted subsoil and no additional foundation.

A high level of safety is ensured by the anchor pins, which allow minimal movement of the system.

Features

- ✓ Very cost efficient systems due to direct installation on compacted soil, asphalt or concrete
- ✓ Easy and quick installation of anchor pins
- ✓ Single-sided installation for limited space

REBLOC RB80SA_12

N2 W1

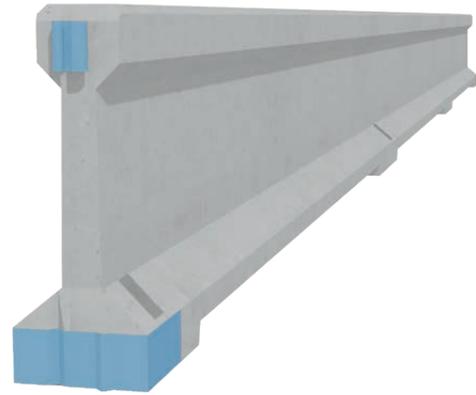
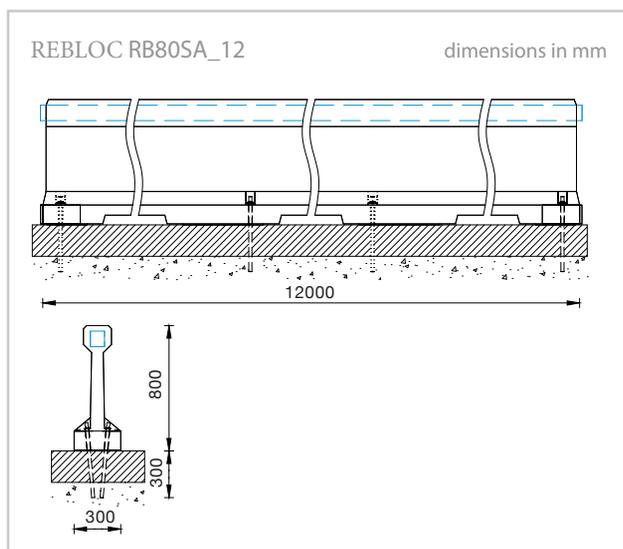
The REBLOC RB80SA_12 is an anchored precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways where space is limited.

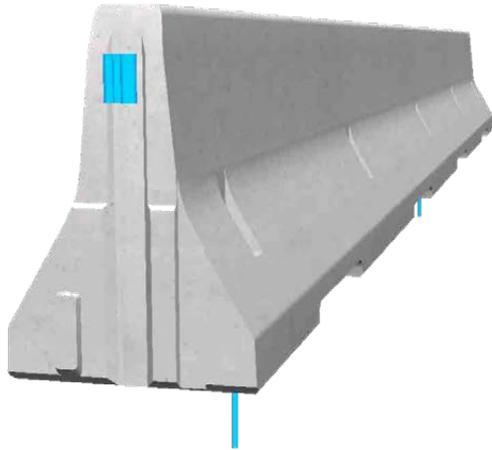
Features

- ✓ Each element is anchored with just four pins so the system can be easily installed, relocated or removed
- ✓ It has a width of just 300mm, making it ideal for narrow roads
- ✓ Elastomer pads are available for low surface pressure and protection of the road surface
- ✓ Can be used as single-sided and double-sided system for the central reserve, or for protection along the verge
- ✓ Cost-efficient system due to installation anchored in asphalt
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Specifications

- » Weight: 3000kg
- » Dimensions(mm): 12000 x 300 x 800
- » Minimum installation: 120m





REBLOC RB80XA_8_3P

H2 W2

REBLOC RB80XA_8_3A

H2 W2

REBLOC RB80XA_8_6P

H2 W2

REBLOC RB80XA_8_6A

H2 W2

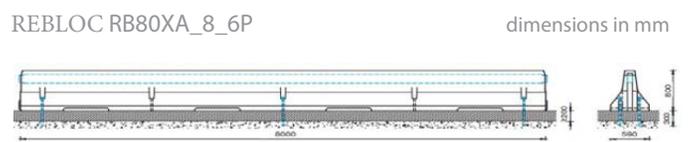
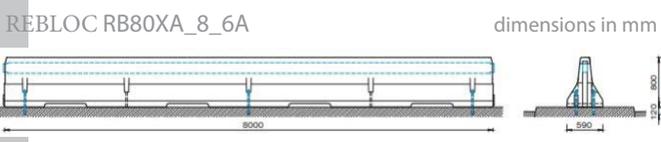
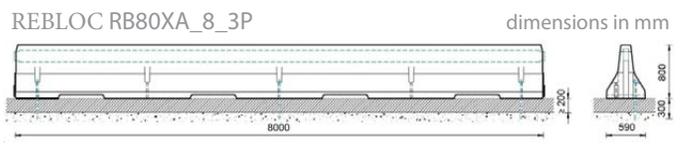
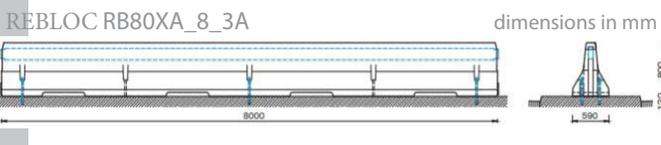
The REBLOC RB80XA_8_3P, RB80XA_8_3A, RB80XA_8_6P and RB80XA_8_6A are anchored precast concrete vehicle restraint systems designed to provide protection on high-speed roads and motorways.

Features

- ✓ Barrier can be pinned into asphalt or anchored into concrete
- ✓ Universal coupling design is quick and easy to install
- ✓ Can be used as single-sided and double-sided systems for the central reserve, or for protection along the verge
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Specifications

- » Weight: 4800kg
- » Dimensions(mm): 8000 x 590 x 800



REBLOC RB80AS_8

H2 W3

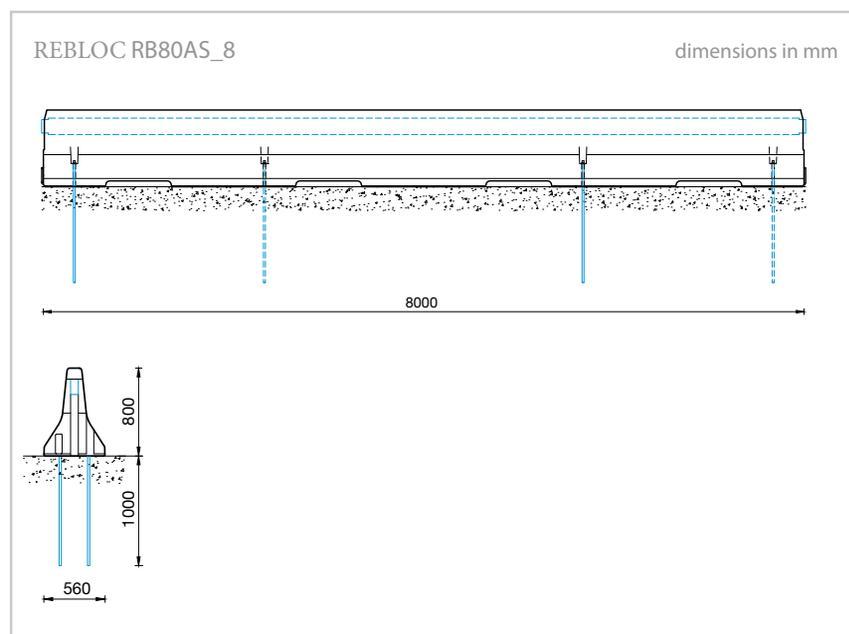
The REBLOC 80AS_8 is an anchored precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways.

Features

- ✓ Can be used as single-sided and double-sided system for the central reserve, or for protection along the verge
- ✓ Cost-efficient system due to installation on compacted soil
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Specifications

- » Weight: 4000kg
- » Dimensions(mm): 8000 x 560 x 800
- » Minimum installation: 64m





REBLOC RB80A_8

H2 W1

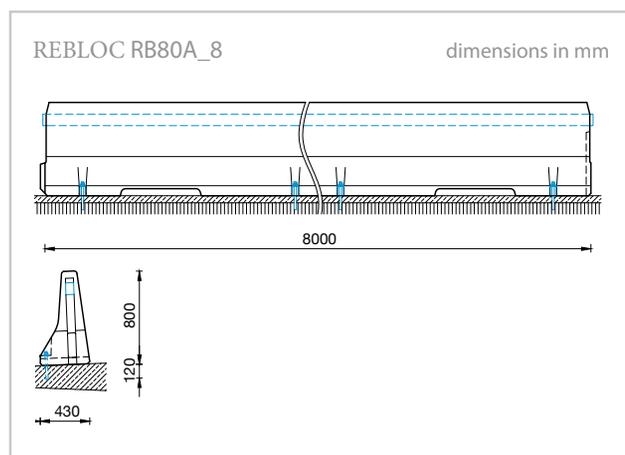
The REBLOC RB80A_8 is an anchored precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways, ideal for the edge of bridges and for the protection of bridge piers.

Features

- ✓ With a minimum working width, this system is ideal for the edge of bridges and for the protection of bridge piers
- ✓ Anchoring depth of only 120mm prevents damage to bridge waterproofing and avoids buried cables
- ✓ No system movement with slim construction
- ✓ Application on outermost edge of bridge possible
- ✓ Can be used as single-sided and double-sided system for the central reserve, or for protection along the verge
- ✓ Cost-efficient system due to installation anchored in concrete
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Specifications

- » Weight: 3700kg
- » Dimensions(mm): 8000 x 430 x 800
- » Minimum installation: 56m



REBLOC RB80XA_8_10A

H2 W1

The REBLOC RB80XA_8_10A is an anchored precast concrete vehicle restraint systems designed to provide protection on high-speed roads and motorways.

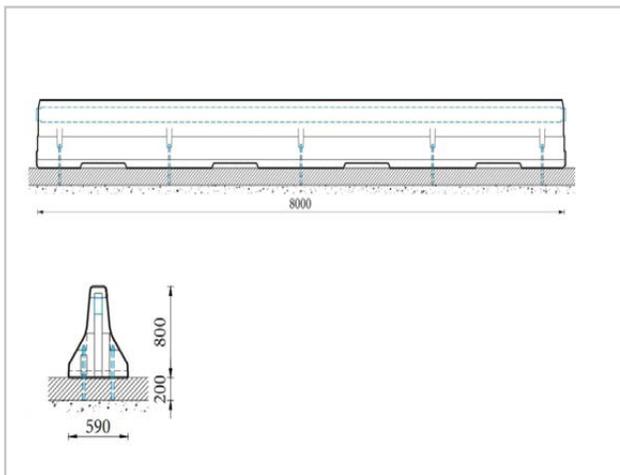
Features

- ✓ Barrier can be anchored into asphalt or concrete
- ✓ Universal coupling design is quick and easy to install
- ✓ Can be used as single-sided and double-sided systems for the central reserve, or for protection along the verge
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Foundations also available.

Specifications

- ›› Weight: 4800kg
- ›› Dimensions(mm): 8000 x 590 x 800
- ›› Minimum installation: 32m



Free-standing

Anchored

Embedded



REBLOC RB80XAU_8_5A

H2 W1

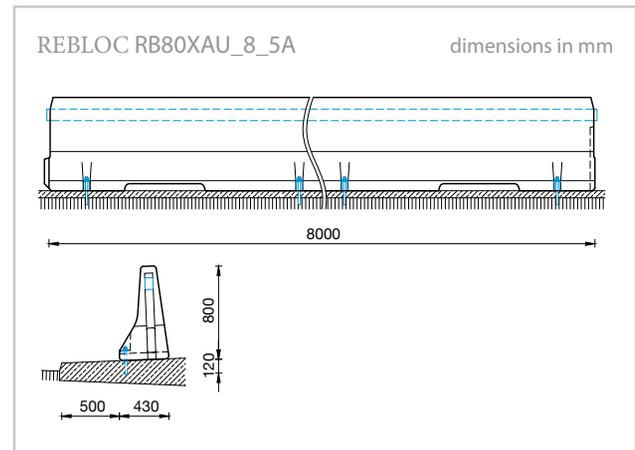
The REBLOC RB80A_8 is an anchored precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways, ideal for the edge of bridges and for the protection of bridge piers.

Features

- ✓ With a minimum working width, this system is ideal for the edge of bridges and for the protection of bridge piers
- ✓ No system movement with slim construction
- ✓ Application on outermost edge of bridge possible
- ✓ Cost-efficient system due to installation anchored in concrete
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Specifications

- » Weight: 4030kg
- » Dimensions(mm): 8000 x 450 x 800
- » Minimum installation: 56m





REBLOC RB100SFA_8

H4b W4

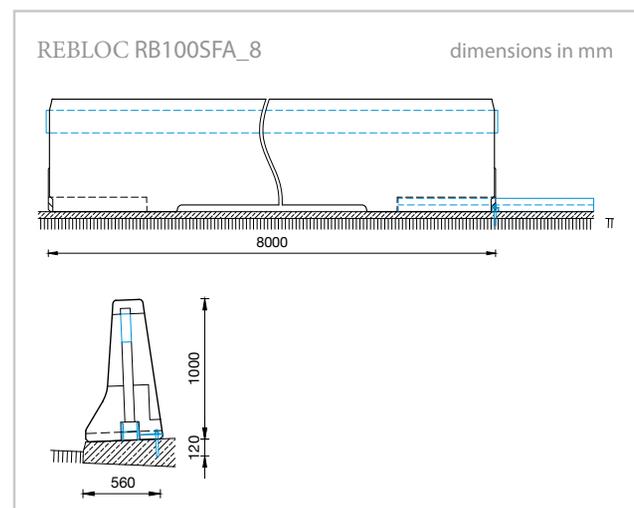
The REBLOC 100SFA_8 is an anchored precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways, ideal for new bridge structures as well as for the refurbishment of existing bridges.

Features

- ✓ The highest containment level H4b offers the best possible protection and even restrains the impact of a 38-tonne lorry travelling at 65 km/h
- ✓ Minimal collision forces transferred into the structure due to the barrier being free-standing
- ✓ Can be used as single-sided and double-sided system for the central reserve, or for protection along the verge
- ✓ Cost-efficient system due to anchored in concrete or asphalt
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Specifications

- » Weight: 6000kg
- » Dimensions(mm): 8000 x 560 x 1000
- » Minimum installation: 96m





REBLOC RB120A_7.5

H4b W2

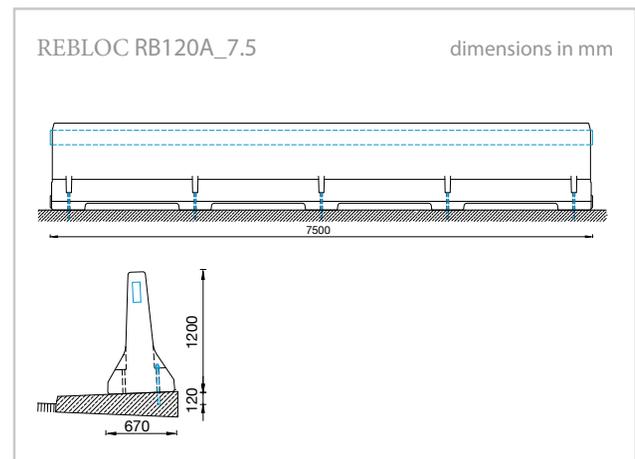
The REBLOC RB120A_7.5 is an anchored precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways, ideal for the edge of bridges and for the protection of bridge piers.

Features

- ✓ Minimal working width
- ✓ Anchoring depth only 120mm in order to protect the bridge sealing
- ✓ Minimal system movement and slim construction
- ✓ Application on outermost edge of bridge possible
- ✓ Can be used as single-sided and double-sided system for the central reserve, or for protection along the verge
- ✓ Cost-efficient system due to installation anchored in concrete
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Specifications

- » Weight: 6000kg
- » Dimensions(mm): 7500 x 670 x 1200
- » Minimum installation: 75m



REBLOC RB100A_8

H2 W1

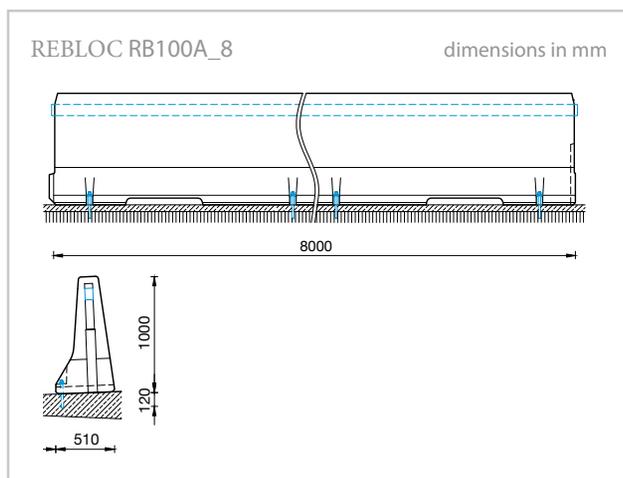
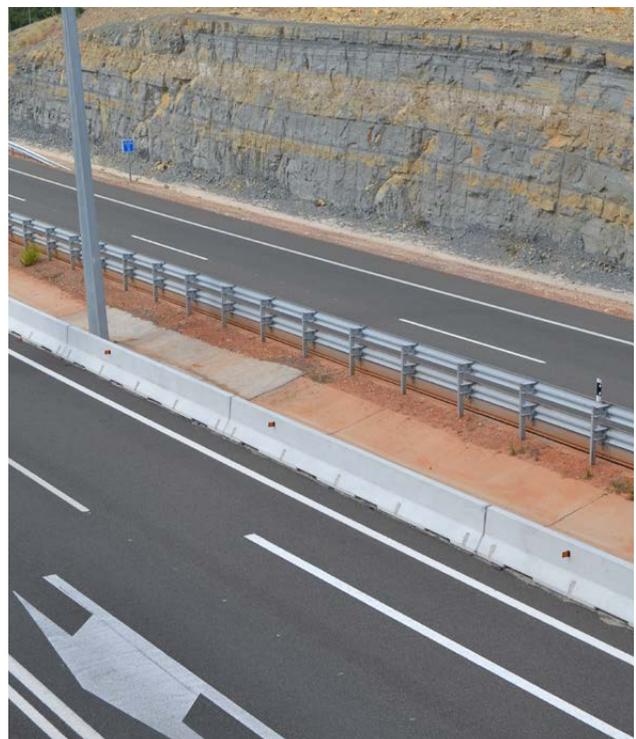
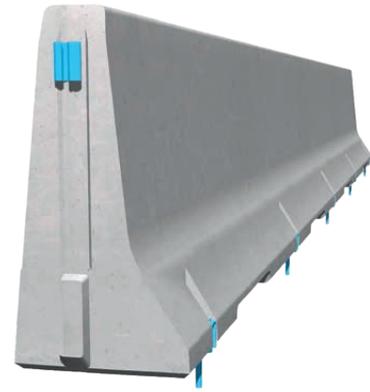
The REBLOC RB100A_8 is an anchored precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways, ideal for the edge of bridges and for the protection of bridge piers.

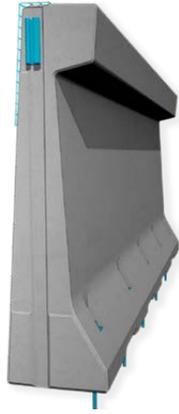
Features

- ✓ With a minimum working width, this system is ideal for the edge of bridges and for the protection of bridge piers
- ✓ Anchoring depth of only 120mm prevents damage to bridge waterproofing and avoids buried cables
- ✓ No system movement with slim construction
- ✓ Application on outermost edge of bridge possible
- ✓ Can be used as single-sided and double-sided system for the central reserve, or for protection along the verge
- ✓ Cost-efficient system due to installation anchored in concrete
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Specifications

- » Weight: 5600kg
- » Dimensions(mm): 8000 x 510 x 1000
- » Minimum installation: 56m





REBLOC RB185A_4_5A

H4a W1

The REBLOC RB185 is an anchored precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways, ideal for the protection of bridge piers.

Features

- ✓ No system movement with slim construction
- ✓ Very high containment
- ✓ Application on outermost edge of bridge possible
- ✓ Cost-efficient system due to installation anchored in concrete
- ✓ No loose parts

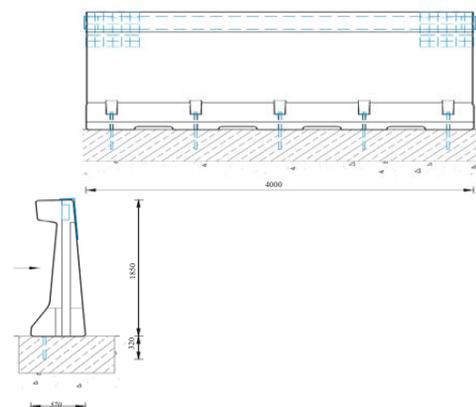
Specifications

- ›› Weight: 5700kg
- ›› Dimensions(mm): 4000 x 570 x 1850
- ›› Minimum installation: 44m (11 Elements)



REBLOC RB185

dimensions in mm



REBLOC RB120AS_7.5

H4b W2

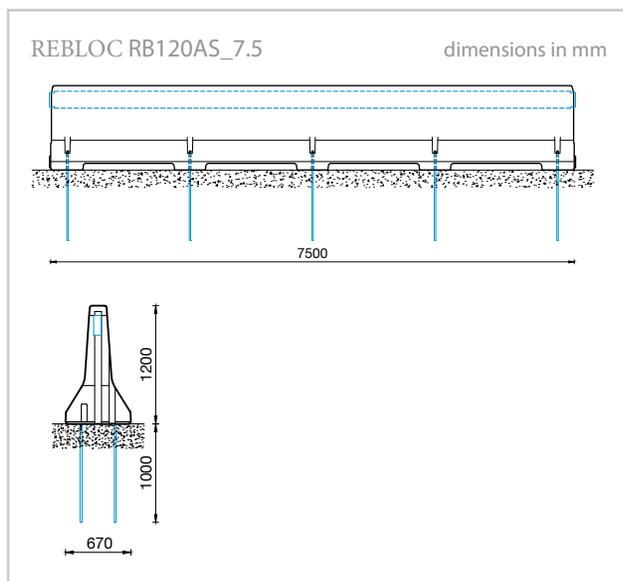
The REBLOC RB120AS_7.5 is an anchored precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways.

Features

- ✓ The highest containment level H4b offers the best possible protection and even restrains the impact of a 38-tonne lorry travelling at 65 km/h
- ✓ Low system movement with high safety level
- ✓ Effective glare protection due to system height of 1200mm
- ✓ Can be used as single-sided and double-sided system for the central reserve, or for protection along the verge
- ✓ Cost-efficient system due to installation on compacted soil
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Specifications

- » Weight: 6000kg
- » Dimensions(mm): 7500 x 670 x 1200
- » Minimum installation: 82.5m





EMBEDDED SYSTEMS

The REBLOC embedded systems can be used where a high containment level is needed within a narrow space.

The systems are available with or without drainage openings.

Features

- ✓ Minimal embedment in asphalt or concrete
- ✓ Optimal usage for limited space due to slim construction
- ✓ No system movement

REBLOC RB92XES_8

H2 W2

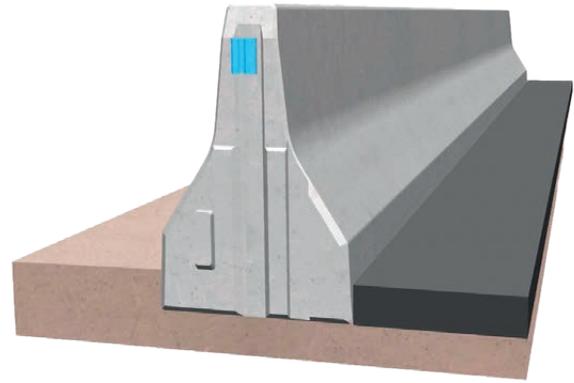
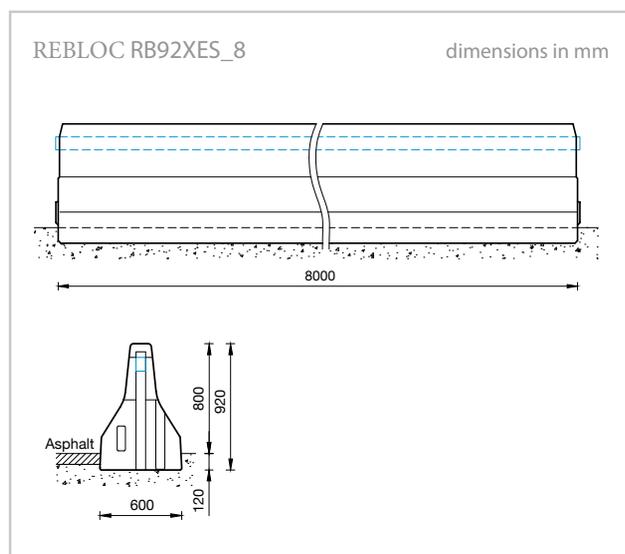
The REBLOC RB92XES_8 is an embedded precast concrete vehicle restraint system designed to provide protection on high-speed roads and motorways where space is limited.

Features

- ✓ Only 120mm embedment in compacted soil
- ✓ High breakthrough prevention due to high containment H2 with low working width W2
- ✓ Usage in central reserve or along the verge
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

Specifications

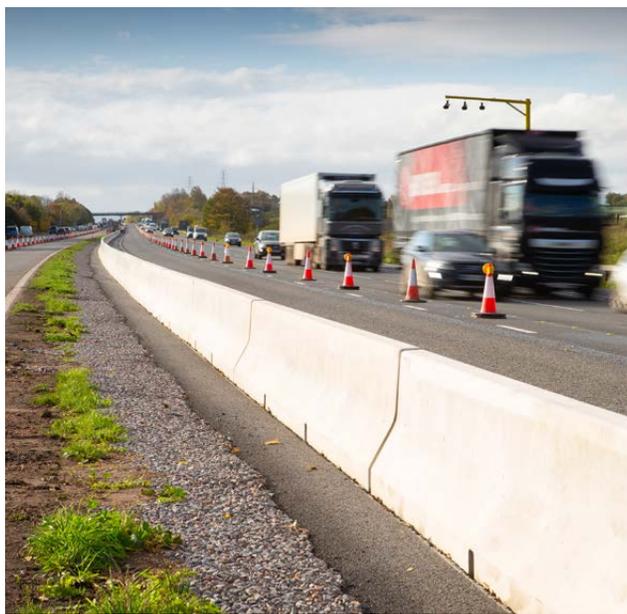
- » Weight: 4800kg
- » Dimensions(mm): 8000 x 600 x 920
- » Minimum installation: 56m



Free-standing

Anchored

Embedded



REBLOC RB84XEA.3_8

REBLOC RB84XEAL_8

H2 W1

The REBLOC RB84XEA.3_8 and the REBLOC RB84XEAL_8 are embedded precast concrete vehicle restraint systems designed to provide protection on high-speed roads and motorways where space is limited.

Features

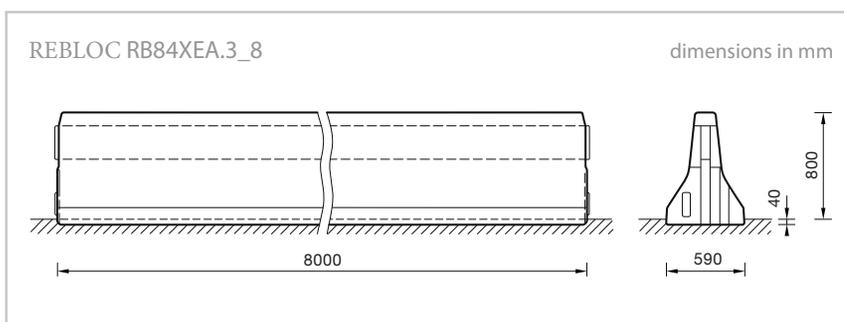
- ✓ Can be embedded into just 40mm of asphalt or concrete
- ✓ Slim construction, making it ideal for narrow roads
- ✓ Drainage option available
- ✓ The minimum installation is only 40 metres
- ✓ Anti-vandalism
- ✓ No loose parts
- ✓ Temporary or permanent solution
- ✓ Protects workforce and other road users

RB84XEA.3_8 Specifications

- » Weight: 4800kg
- » Dimensions(mm): 8000 x 590 x 840
- » Minimum installation: 32m

RB84XEAL_8 Specifications

- » Weight: 4800kg
- » Dimensions(mm): 8000 x 590 x 840
- » Minimum installation: 40m





COUPLINGS & SPECIAL ELEMENTS

The REBLOC integrated innovative coupling system connects the individual elements to form a continuous and strong chain, which safely dissipates the energy created in a collision and prevents vehicles from breaking through the barrier.

Safety and practicality are substantially increased because the REBLOC system does not contain any loose parts.

The Benefits

- ✓ The symmetrical couplings enable you to install the elements from any side
- ✓ The profile of the concrete barriers reduces the impact severity, which in turn controls the behaviour of the vehicle and protects the passengers
- ✓ Once installed, the system is immediately ready for use
- ✓ This significant advantage has positive effects on the construction time and the project overall.
- ✓ Individual elements can easily be inserted or removed from the continuous element chain for repair, maintenance and structural alteration works

Special Elements

Safety does not stop with the last REBLOC concrete barrier. Customised elements are available for connecting to existing systems and for many special applications.

REBLOC offers engineered elements to provide solutions for the most challenging installation conditions. These include transition elements, terminal elements, bifurcations, light column elements and many more.





REBLOC TO GUARDRAIL TRANSITION

This crash test rated transition element allows for seamless integration between our Rebloc concrete barrier system to steel Guardrail barriers, providing an end to end compliant VRS solution.

Features

- ✓ DD ENV 1317-4:2002 Crash Test Rating
- ✓ Simplified Installation
- ✓ Reduced Material Usage

Compatible Steel Guardrail

- » SPR4- Single Sided N2W1
- » SPR4- Single Sided N2W2
- » SPR4- Single Sided N2W3
- » Flexbeam PLUS- Single Sided N2W1 (1.2m Line Post Centres)
- » Flexbeam PLUS- Single Sided N2W2 (2.0m Line Post Centres)
- » Flexbeam PLUS- Single Sided N2W3 (2.8m Line Post Centres)

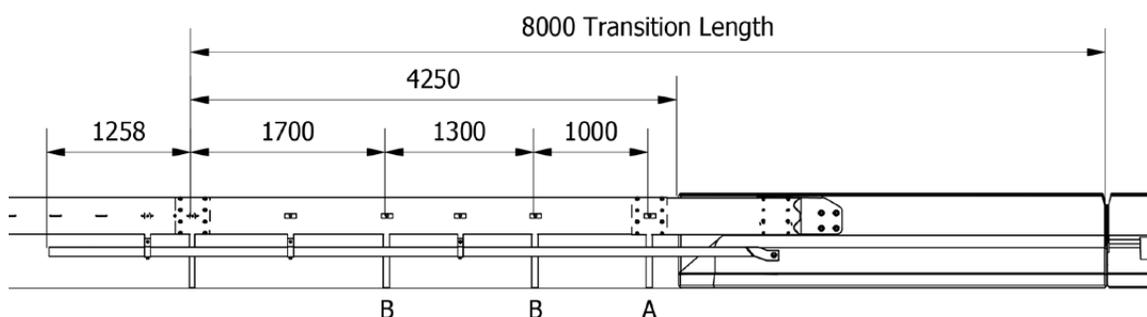
Compatible Concrete Rebloc

- » RB80XA_8
- » RB84XEAL_8
- » RB84XEA.3_8



Rebloc to GuardRail Transition

dimensions in mm



PRODUCT NAME GUIDANCE

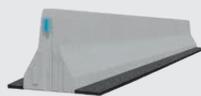
All of the REBLOC products have been carefully named to reflect the system so that they can be easily and quickly identified. The product name includes the height, length, installation description and product specification.

REBLOC Product	Height in CM	Installation / product description		Length in M	Product Specification		Containment level / Working width
REBLOC	80	A		8			H2/W1
REFENCE	50	A	Anchored	2	A	Asymmetric	e.g.: T3/W2 H1/W4
NB Noise Barrier	60	AS	Anchored Soil	4	B	Bifurcation	
	80	BF	BackFilled	4.5	C	Countersunk	
	84	BFS	BackFilled Symmetric	5	EDSP	Einfache DistanzSchutzPlanke	
	85	H	Heavy	6	EG	Emergency Gate	
	92	L	Light	7.5	EXC	EXpansion joint element Coupling	
	100	S	Slim	8	EXM	EXpansion joint element Mechanically	
	110	SA(Q)	Slim Anchored	12	G	Gantry	
	120	SF	Shear Force		N	Normal Elements	
	140	SFA	Shear Force Anchor		LC	Light Column	
	185	SFP	Shear Force Pin		S	Steel transition element	
		SFS	Shear Force Symmetric		T	Terminal element	
		X	eXtra profile		TS	Traffic Sign element	
		XH	eXtra profile Heavy				
		XA	eXtra profile Anchored				
		XAS	eXtra profile Anchored Soil				
		XEAL	eXtra profile Embedded Asphalt Light				
		XES	eXtra profile Embedded Soil				
		XW	eXtra profile Wall				

Permanent Systems



Free-standing



Embedded



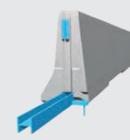
Backfilled



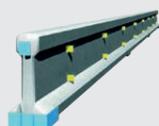
Anchored Soil



Anchored



Free-standing with position securing



Temporary Systems



Transitions



Integrated Noise Barrier

SYSTEMS OVERVIEW

The tables below include all REBLOC product codes and the containment/working width classes that apply to them:

Standard Systems:

Containment level	Working width					
	W1	W2	W3	W4	W5	W6
H4b		120AS_7.5** 120A_7.5* 185A.1_4_5a		100SFA_8*	100SF_8 100SFS_8 100SFSA_8 120_7.5	100_8 110_8
H4a	185A_4_5a			140SFS_5.5		
H3					100L_8 100_8 NB100XH/300_8	100H_2 100H_3 100H_4
H2	80A_8* 80XA_8_10A** 80XW_8 100A_8* 84XEAL_8** 84XEA.3_8** 80XAU_8_5A	80XA_8_3A* 80XA_8_6A** 80XA_8_3P** 80XA_8_6P** 80XAS_8_10P** 92XES_8**	80AS_8** 80XAS_8_4P** 100SFP_8* 100SF_8	80X_8 80XAS_8 100SFS_8 100SFSA_8 NB100/300_8 NBL100X/200-450_5	80H_8 85BF_8** 100_2 100_3 100_4 100_8 100L_6 110L_8	
H1	80XA - Low Carbon			80S_12 80SAQ_12 80SA_6 80_8 80H_8	80L_8 REFENCE 80H_8+124.02	
N2	80SA_6** 80SA_12** 80SAQ_12**		80SA_12 80SAQ_12 80_8 80H_8 80H_8LCS 80XA_8 80XAS_8 84XEAL_8 84XEA.3_8	60H_12 80SA_4 80SA_6 80S_12 80L_4		
N1						
T3	50H_12 85BF_8	50_12 50H_4 REFENCE 50H_12+104.01 60_6 60_12 60H_12	80SA_4 80SA_6 80S_12 80SAQ_12 80X_8 80XAS_8 85BFS_8	REFENCE 50H_12+124.01	50H_EG12	
T2						
T1	50_12 50H_12 60_12 80XAS_8 85BF(S)_8					

* Bridge Systems | ** Systems with anchorage/backfilling (no free standing installation)

Legend:

Containment level: The given containment level also meets the test conditions of a lower level (except that N1 and N2 do not include T3 and H1, ..., H4b do not include N2).

Classes of working width levels: The given working width also meets the following higher working width levels.

PERFORMANCE CLASSES

REBLOC systems are thoroughly tested in accordance with EN1317 and are CE certified. Each product has been awarded a containment class and a working width level. This table explains what the performance classes mean:

Containment levels, vehicle impact test criteria

Containment level	Acceptance test	Impact speed(km/h)	Impact angle (°)	Total vehicle mass (kg)	Kinetic energy (kJ)
T1	TB21	80	8	1.300	6,2
T2	TB22	80	15	1.300	21,5
T3	TB21	80	8	1.300	-
	TB41	70	8	10.000	36,6
N1	TB31	80	20	1.500	43,3
N2	TB32	110	20	1.500	81,9
	TB11	100	20	900	-
H1	TB42	70	15	10.000	126,6
	TB11	100	20	900	-
H2	TB51	70	20	13.000	287,5
	TB11	100	20	900	-
H3	TB61	80	20	16.000	462,1
	TB11	100	20	900	-
H4a	TB71	65	20	30.000	572,0
	TB11	100	20	900	-
H4b	TB81	65	20	38.000	724,6
	TB11	100	20	900	-

Vehicle Intrusion

Containment level	Acceptance test
VI1	$V_{In} \leq 0.6$
VI2	$V_{In} \leq 0.8$
VI3	$V_{In} \leq 1.0$
VI4	$V_{In} \leq 1.3$
VI5	$V_{In} \leq 1.7$
VI6	$V_{In} \leq 2.1$
VI7	$V_{In} \leq 2.5$
VI8	$V_{In} \leq 3.5$
VI9	$V_{In} \leq 3.5$

Impact severity levels

Impact severity level	Index values
A	$ASI \leq 1,0$
B	$ASI \leq 1,4$
C	$ASI \leq 1,9$

and THIV \leq
33km/h

Levels of working width

Containment level	Acceptance test
W1	$W_n \leq 0,6$
W2	$W_n \leq 0,8$
W3	$W_n \leq 1,0$
W4	$W_n \leq 1,3$
W5	$W_n \leq 1,7$
W6	$W_n \leq 2,1$



 0115 983 2304

 sales@hardstaffbarriers.com

 A Division of Hill & Smith Infrastructure LTD, Hillside, Gotham Road,
Kingston-on-Soar, Nottingham, NG11 0DF