

TENSARTECH™ TW3 WALL

EARTH RETAINING SYSTEM FOR WALLS



➤ Tensor® offers a broad variety of cost effective and attractive alternatives for all types of construction projects requiring retaining walls or slopes.

Tensor Technology – Proven Practical Solutions and the Know-How to Get them Built

TensorTech™ systems are based on Tensor Technology and the proven performance of Tensor geogrids. Tensor Technology is widely adopted for ground stabilisation problems and reinforced soil structures, delivering real savings in cost and time. We can help you apply Tensor Technology to deliver the best value on your project.



Building in Confidence with the TensorTech™ TW3 Wall System

The TensorTech™ TW3 Wall System consists of pre-cast concrete modular facing blocks in combination with Tensor geogrids which reinforce the soil mass behind. The high efficiency connection between facing unit and geogrid is a distinctive feature of the system, creating strong and durable, maintenance free retaining wall structures.

Factory produced concrete blocks made to exacting standards and close tolerances together with the high-density polyethylene (HDPE) geogrid reinforcement provide resilient permanent retaining walls and bridge abutments which have design lives of up to 120 years.

Continual research in the laboratory and monitoring in the field has provided a detailed understanding of the behaviour of this type of structure. The strength of the connection between the geogrid reinforcement and the block facing has proved to be critically important.

The distinctive geometry of the concrete facing blocks allows the creation of both internal and external curves. Corners, stairs and other features are easily detailed.

The high pH associated with concrete blocks does not affect the durability and functionality of HDPE geogrid reinforcement during the life of the structure.



TensorTech™ TW3 concrete blocks are dry laid, without mortar.



External corner blocks and copings allow neat detailing.



A feature common to all TensorTech™ Wall Systems is the high efficiency connection between geogrid and facing unit, which is quick and easy to install.



TensarTech™ TW3 Wall System for Proven Construction of Retaining Walls and Bridge Abutments

The cost effectiveness and versatility of the TensarTech™ TW3 Wall System offers clients, specifiers and contractors many advantages over other traditional methods, such as reinforced concrete, for the construction of retaining walls and bridge abutments:

- ▶ Rapid and economical construction
- ▶ Attractive range of modular block, finishes and colours
- ▶ Durable with little or no maintenance
- ▶ Often no specialist construction skills necessary
- ▶ Greater tolerance of differential settlement
- ▶ Adaptable to provide aesthetic architectural effect
- ▶ Optimises the use of available space
- ▶ High resistance to earthquake loading
- ▶ Possibility of using site-won or recycled granular fill materials
- ▶ Low bearing pressure may avoid expensive foundation treatment



The TensarTech™ TW3 Wall System can be built without cranes or propping.



Construction of attractive infrastructure retaining walls with structures with a 120 year design life.

Independent Assessment and Approval

Both the TensarTech™ TW3 Wall System and Tensar RE geogrids have been awarded British Board of Agrément (BBA) Roads and Bridges certificates allowing their design and specification in to highways structures and bridge abutments with a 120 year design life. The BBA certificates are evidence that both the TensarTech TW3 Wall System and Tensar RE geogrids have been evaluated independently for fitness for intended use.

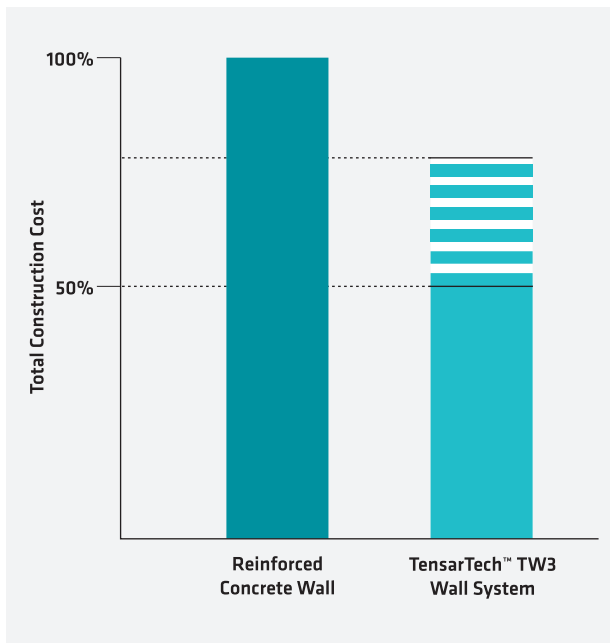


Unsurpassed Experience and Reliability

Tensar International is a world leader in geogrid technology and the provision of high performance earth retaining systems, with over 30 years experience. Many thousands of reinforced soil structures, in many varied geotechnical and climatic conditions, have been designed and built using Tensar Technology around the world.

Offering Cost Effectiveness and Versatility

Savings of up to 50% over conventional construction methods such as reinforced concrete can be achieved by constructing with the TensarTech™ TW3 Wall System. In addition construction time may also be significantly reduced.



TensarTech™ TW3 blocks are delivered on pallets to the point of installation.

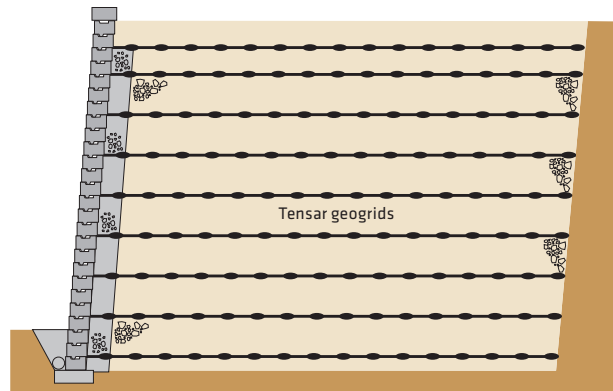
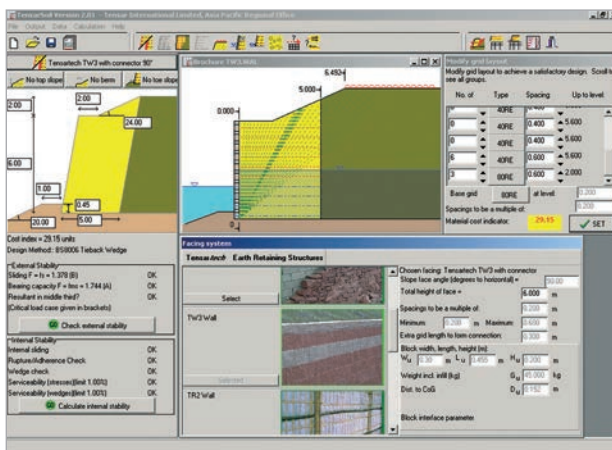
Many TensarTech™ TW3 Structures are in Service - A Proven Success



Design Service

Tensar's Civil Engineers are available to help take your project to the next stage. They are able to provide an Application Suggestion to prove feasibility and help with planning costings. Tensar can also provide certified detailed design and

drawings for using Tensar products and systems on your project with this design work being covered by Tensar's Professional Indemnity (PI) insurance.



Reinforced Soil Wall Design Software

For more than twenty five years Tensar has developed some of the most sophisticated reinforced soil design software in the world. This is used to provide clients with economically

efficient, accurate and timely Application Suggestions, assisting in scheme design from feasibility right through to construction.



Construction is straightforward and often requires no specialist skills or construction equipment.



TensarTech™ TW3 facing units are simple to install and can easily accommodate tight concave or convex horizontal curves.

Your local distributor is:

Tensar[®]

Tensar International Limited
Units 2-4 Cunningham Court
Shadsworth Business Park
Blackburn BB1 2QX
United Kingdom

Tel: +44 (0)1254 262431
Fax: +44 (0)1254 266867
e-mail: info@tensar.co.uk
tensar-international.com



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Contact Tensar or your local distributor to receive further literature covering Tensar products and applications.

Also available on request are product specifications, installation guides and specification notes.

The complete range of Tensar literature consists of:

- ▶ **Tensar Geosynthetics in Civil Engineering**
A guide to products, systems and services
- ▶ **Ground Stabilisation**
Stabilising unbound layers in roads and trafficked areas
- ▶ **TriAx[®]: A Revolution in Geogrid Technology**
The properties and performance advantages of Tensar[®] TriAx[®] geogrids
- ▶ **Asphalt Pavements**
Reinforcing asphalt layers in roads and trafficked areas
- ▶ **TensarTech[™] Earth Retaining Systems**
Bridge abutments, retaining walls and steep slopes
- ▶ **Railways**
Mechanical stabilisation of track ballast and sub-ballast
- ▶ **Foundations Over Piles**
Constructing over weak ground without settlement
- ▶ **Basal Reinforcement**
Using Basetex high-strength geotextiles
- ▶ **TensarTech Foundation Mattress System**
- ▶ **Erosion**
Controlling erosion on soil and rock slopes