



Building Product Information Sheet | Class 1

Product Name:

Ezi Wall®, Sedona Stone®, Garden Wall®, County Manor®, KeySteel®, Compac® III

Product Line: Firth Retaining Wall Systems

Product Description & its intended use (*measurements, materials, usage*):

Firth manufactures a range of masonry retaining wall systems in a variety of colours and textures for use as segmental retaining walls. Firth segmental retaining products are combined with other products such as geogrid reinforcement, keystone pins, draining aggregates, drainage pipes, and footings to make up a system.

Firth manufactures its concrete retaining walls systems to AS/NZS4455 with testing to AS/NZS4456 with an independently audited quality management system confirming to AS/NZS ISO9001.

Building Product Warranty statements are available on the Firth website.

Product Identifier: N/A

Place of Manufacture: Aotearoa New Zealand

Legal & Trading name of Manufacturer(s): FLETCHER CONCRETE AND INFRASTRUCTURE LIMITED

Address for Service:

810 Great South Rd
Penrose
Auckland 1061

Website: <https://www.firth.co.nz>

Email Address: info@firth.co.nz

Phone No.: 0800 FIRTH 1 / 0800 347 841

NZBN (If applicable): N/A



Relevant Building Code Clauses:

Firth manufactures its concrete retaining wall products to AS/NZS4455 with testing to AS/NZS4456 with an independently audited quality management system confirming to AS/NZS ISO9001.

With appropriate design, construction, and maintenance (see below), Firth Retaining Wall Systems can demonstrate compliance with-

- B1-Structure: Performance clauses B1.3.1 to B1.3.4
- B2- Durability: Performance clauses B2.3.1(a) and B2.3.2.
- F2- Hazardous materials: Performance clauses F2.3.1

Statement on how the building product is expected to contribute to compliance:

Masonry retaining wall systems require specific engineering design by appropriately experienced chartered professional engineers with the exception of low landscape walls without a surcharge. Refer Firth retaining wall brochures for low landscape walls and DIY guides for Sedona Stone®, Garden Wall®, and Compac® III. Retaining products are combined with other products such as geogrid reinforcement, keystone pins, draining aggregates, drainage pipes, and footings to make up a system. To ensure compliance with the NZ Building Code, design needs to comply with recognised design processes for segmental retaining walls. Firth documents are available for free download on the Firth website.

Installation of retaining wall systems need to be conducted by experienced Licensed Building Practitioners and in accordance with the system documentation on the Firth website.

Structure - B1: Firth retaining blocks achieve compressive strengths stated on the Firth website.

Durability - B2: In normal ground conditions (non-aggressive) and non-abrasive environments, the compressive strength of Firth retaining blocks achieve compliance with section B2 of the NZBC.

Hazardous Building Materials - F2: Firth concrete retaining blocks comply with the requirements of section F2.3.1 of the NZBC. Safety data sheets are available on the Firth website.

Limitations on the use of the building product:

All retaining wall must comply with the building code however low retaining walls without a surcharge can be constructed without Specific engineering design. Refer to the *Retaining Wall by Firth* brochure and DIY guides for Sedona Stone®, Garden Wall® and Compac® III for guidance. Most retaining walls will require specific engineering design, with design undertaken by suitably experienced Chartered Professional engineers.

The texture and colour of Firth segmental retaining walls will vary due to the natural materials used in manufacture. Minor chipping, cracking and efflorescence is not deemed a product defect when evaluated and deemed compliant with ASTM C21615.



Design requirements that would support the use of the building product:

Concrete segmental retaining walls is a product which is combined with a range of other products to produce the end wall product.

To ensure compliance with the NZBC, design to determine the performance requirements of the retaining wall system shall be conducted by suitably qualified persons familiar with a range of NZ Design Standards and the preparation of specifications for construction.

Installation requirements:

Installation shall be conducted by suitable qualified and experienced Licensed building professionals. Installers shall have full and comprehensive knowledge of the installation of segmental retaining walls. Installation shall be in accordance with the designer's specification.

Maintenance Requirements:

Firth segmental retaining walls shall be maintained by annual inspection and cleaning as necessary as specified by the designer.

Is the building product/building product line subject to warning or ban under section 26?

Yes No

If yes, description of warning or ban under section 26: N/A

Date: 08/11/23