Global Research
TURNING INFORMATION INTO INSIGHT

Public consultation on the revision of NZS 3604:2011 *Timber-Framed Buildings*

Public comment analysis

Executive Summary

21ST October 2026

Prepared by: Global Research Ltd for Standards New Zealand

Executive Summary

Overview

The recent public consultation on the draft revision of NZS 3604 *Timber-framed buildings* received 2,310 comments across the Foreword and 15 sections of the draft standard. Three themes recurred across the comments:

- **Three-storey scope.** Extending the Standard to three-storey buildings while excluding their bracing design from the prescriptive provisions was widely seen as creating uncertainty about where NZS 3604 ends and specific design begins.
- **Ground conditions.** The new provisions for moderately liquefiable and expansive ground were supported in principle, but commenters found the definitions and assessment requirements unclear and questioned the cost of site investigation.
- **Thermal performance.** Many commenters sought details that support continuous insulation and reduce thermal bridging, in line with the Clause H1 *Energy-Efficiency* requirements.

Commenters also identified some errors, inconsistent cross-references, unclear figures and outdated referenced documents.

Most commented sections

Section 5 *Bracing design* (261 comments)

- **Three-storey bracing.** Commenters sought a clear statement of the scope limitation for three-storey buildings and part storeys, and some questioned the reliability of P21-rated bracing systems.
- **Minimum bracing capacity.** The increase from 15 to 30 bracing units per metre was questioned, with requests for its engineering basis given the cost implications; a smaller number supported a stricter requirement.
- **Hazard maps and demand values.** The earthquake zone map was criticised for misplaced towns and zone boundaries, and the lee zone map for poor legibility. Several commenters noted that seismic bracing demands appear to have reduced and asked that they be retained or increased.

Section 7 *Floors* (377 comments)

- **Slab-edge insulation.** The most frequent request was to permit insulation beneath perimeter footings and slab thickenings, and to dimension the permitted framing overhang to accommodate the slab-edge insulation needed for H1 compliance.
- **Errors in figures.** Commenters identified inaccurate reinforcement details, unclear dowel bar placement, and incorrect clause and figure references in the slab and footing figures, notably Figure 7.15.
- **Timber floors.** The new minimum stiffness requirements for sheet flooring raised concern about their effect on particleboard and some plywood products. Commenters also sought nailing schedules for thicker sheets, screw-fixing options, and clearer blocking requirements where bracing walls sit on floors.

Section 8 *Walls* (294 comments)

- **Stud selection tables.** The stud selection tables, notably Table 8.2b, were considered difficult to read, and include timber sizes uncommon in the New Zealand market.
- **Thermal performance**. Commenters asked for rigid air barriers to be recognised as lateral restraint for studs, and for thermally-improved wall junction details to become the default.
- **Bracing and connections.** Comments addressed compatibility between masonry and timber bracing elements, verification of proprietary systems, and top-plate and hold-down connections. Several commenters requested standard timber balustrade designs.

Common points (themes) in the next five sections

Section 1 Scope and interpretation (220 comments). Comment focused on the three-storey scope and on unclear definitions for good ground, expansive soils and moderately liquefiable ground. Commenters also noted that scope limitations are dispersed through later sections and commentary, and that the Figure 1.1 flowchart contains errors.

Section 2 General (186 comments). Commenters sought recognition of screwed connections alongside nails, clearer fixing requirements including coach screws and anchor edge distances, and clearer compliance pathways for particleboard, OSB and plywood.

Section 3 Site requirements (197 comments). Liquefaction and expansive soil terminology and assessment methods were seen as unclear, and commenters questioned whether the new geotechnical investigation requirements are proportionate for small or low-risk projects. Clearer requirements for bearing capacity testing were also sought.

Section 6 Foundation and subfloor framing (225 comments). Commenters questioned the unexplained increase in pile sizes and identified inconsistencies in anchor pile depth requirements.

Section 10 Roof framing (125 comments). Commenters identified inconsistencies in the rafter span tables and sought separate light and heavy roof selections. Several requested standard provisions for raised-heel trusses to allow full-depth ceiling insulation at the eaves, and others noted ambiguous purlin requirements and incorrect references.

Remaining sections

The remaining eight parts drew a combined 430 comments: Section 4 Durability (104), the Foreword and references (85), Section 9 Posts (58), Section 13 Ceilings (49), Section 11 Building envelope (42), Section 14 3 kPa floor loads (35), Section 15 Snow loadings (34) and Section 12 Interior linings (23).

Commenters noted an outdated list of referenced documents and sought clearer protection requirements for fixings in contact with treated timber. Others requested additional post connection details, clarity on whether sloping ceilings can act as diaphragms, and typical ceiling diaphragm connection details.

Many commenters found the online consultation platform difficult to use for a document of more than 300 pages.

Interpreting the results

Comment volume provides a useful indication of where the draft attracted the greatest attention, but it should not be treated as a direct measure of either the number of affected stakeholders or the relative importance of issues raised. In several of the sections, a substantial share of comments came from one or two commenters who submitted long, numbered series of proposed amendments. These included claims that changes to exposure zones, 3 kPa floor loads and snow loads had not been carried consistently through the draft. Each proposal should therefore be assessed on its technical merit, evidence and implications, rather than on comment count alone.

Overall implication

The public consultation indicates broad engagement with the NZS 3604 revision and support for addressing new building forms, ground conditions and energy-efficiency expectations. It also identifies several areas where the draft is not yet sufficiently clear, internally consistent or readily usable. Priority should be given to clarifying the three-storey scope and specific-design boundaries; resolving the ground-condition definitions and investigation pathway; reviewing thermal-bridging details; correcting figures, maps and cross-references; and confirming the technical basis for significant changes to bracing, foundations and floor systems.

Analysis approach

The main purpose of the analysis was to increase the efficiency and effectiveness of the standard's review committee. All comments were read by analysts and grouped according to the section and clause addressed within. This was necessary, because commenters' identification of standard aspects was inconsistent, and doing so makes review of individual aspects far more efficient. This sorting of comments was assisted by dedicated qualitative analysis software, a non-AI and fully human-directed process (NVivo). Analysts also identified and summarised the key points in longer comments, and grouped together identical points made in multiple comments.

Where comments numbered three or more on a particular aspect of the standard, summaries were prepared which presented shared issues, shared changes and differences in the comments. These summaries were prepared with assistance from Global Research's dedicated public consultation AI tool, STOA, and were reviewed by analysts against the verbatim comments.

Public comments and feedback received by Standards New Zealand, have already been shared with the committee, who will consider them all before finalising the standard.