

Determination 2026/011

Compliance of part of a pool barrier – a wall of a building with a bi-fold window – with Building Code Clause F9

23 Selby Lane, Hastings

Summary

This determination considers whether part of a proposed pool barrier complies with Building Code Clause F9 *Means of restricting access to residential pools*. The part of the barrier at issue comprises a wall of a house which has a bi-fold window.

The determination also discusses the requirements of the Acceptable Solution for Clause F9 that relate to openable windows in a building wall forming a pool barrier.



Figure 1: The wall and bi-fold window from the proposed pool area¹

¹ Reproduced from a photograph provided by the owners.

In this determination, unless otherwise stated, references to “sections” are to sections of the Building Act 2004 (“the Act”) and references to “clauses” are to clauses in Schedule 1 (“the Building Code”) of the Building Regulations 1992.

The Act and the Building Code are available at www.legislation.govt.nz. Information about the legislation, as well as past determinations, compliance documents (eg, Acceptable Solutions) and guidance issued by the Ministry, is available at www.building.govt.nz.

1. The matter to be determined

- 1.1. This is a determination made under due authorisation by me, Peta Hird, for and on behalf of the Chief Executive of the Ministry of Business, Innovation and Employment (“the Ministry”).²
- 1.2. The parties to the determination are:
 - 1.2.1. J and M Anderson, the owners of the property, who applied for this determination (“the owners”)
 - 1.2.2. Hastings District Council (“the authority”), in its role as the building consent authority.
- 1.3. I consider B Justham is a person with an interest in this determination, as the designer of the proposed pool and barrier at the owners’ property (“the designer”).
- 1.4. The matter to be determined, under section 177(1)(a), is whether part of a proposed pool barrier comprising a wall of the house with a bi-fold window complies with Clause F9 *Means of restricting access to residential pools*.
- 1.5. In deciding this matter, I consider the requirements of clause F9 and the application of Acceptable Solution F9/AS1 (“F9/AS1”).³
- 1.6. This determination does not consider the owners’ application for a building consent for construction of the pool and barrier, which the authority has not granted due to its concerns regarding compliance of the part of the barrier in issue.

2. The building work and background

- 2.1. The owners have constructed a new house on the property.⁴ They propose to install a pool in the northeast corner of the property, with the barrier to be formed by boundary fences on two sides, and a combination of internal fences and the walls of the house on the other two sides. The two walls of the house forming part of the

² The Building Act 2004, section 185(1)(a) provides the Chief Executive of the Ministry with the power to make determinations.

³ Acceptable Solution F9/AS1 *Residential Pool Barriers* (first edition, effective 27 April 2017).

⁴ Pursuant to Building Consent ABA20250635

barrier each have a window; the authority is concerned with the wall that has a bi-fold window (as shown in Figure 1).

- 2.2. The bi-fold window is 2.4m wide and 1.2m high. It is approximately 700mm from the end of the wall on each side. The sill of the bi-fold window is approximately 1070mm above the floor level inside the house, and approximately 1220mm above the ground outside the house.
- 2.3. The owners applied to the authority for a building consent for the proposed pool and barrier.⁵ In processing the application, on 13 January 2026 the authority sent the owners a 'request for information', stating in relation to the bi-fold window:

You have stated ... you will comply with [Acceptable Solution] F9/AS1 [paragraph] 4.1.1(a), however there is no control over the "projections" underneath the window (e.g. furniture, appliances within the lounge area). Provide another solution for this proposal to demonstrate compliance with NZBC clause F9.3.4(b).

- 2.4. The owners replied to the authority that the house and bi-fold window had been built "following the code as indicated to meet compliance", and provided photographs of the bi-fold window with measurements.
- 2.5. On 21 January 2026, the authority sent the owners a second request for information, stating:

... The functional requirement of NZBC [clause] F9 is to prevent unsupervised access by children to residential swimming pools. Given the location of the proposed window within the lounge area, and the typical furnishings and features associated with such spaces, it is likely that projections will be placed beneath the window. Consequently, compliance with the full requirements of [F9/AS1 paragraph] 4.1.1(a) cannot be demonstrated. The proposed bi-fold window configuration within the designated lounge area is therefore considered to present a high-risk scenario.

- 2.6. The authority asked the owners to provide either revised plans showing relocation of the barrier, details of compliant window restrictors or permanent screening to prevent access, or confirmation that a determination would be sought from the Ministry.

3. Submissions

Owners

- 3.1. The owners submit:
 - 3.1.1. "During the design of our house and pool area, we consulted the Acceptable Solution F9/AS1 to ensure that the building envelope would form part of a compliant barrier. In particular, we relied on [paragraph] 4.1.1 ... Our

⁵ Building Consent application ABA20260003.

window has a sill height exceeding 1000 mm (approximately 1070mm), with no projections beneath it greater than 10mm.”

- 3.1.2. “While we acknowledge that any pool barrier could theoretically be compromised by moveable objects, we understand that ongoing compliance is the responsibility of the homeowner, not the barrier itself. Further the location of the window – within a circulation space leading to the lounge – means items would not be stored beneath it.”
- 3.1.3. “Our concern is that if acceptable solutions cannot be relied upon in accordance with their stated provisions, homeowners and designers have no clear pathway for achieving compliance.”
- 3.1.4. “[The authority] stated that F9/AS1 Paragraph 2.1.6 (no features within 1200mm of the top of the pool fence) could not be satisfied if they treated the window to the same test. You will notice that in [part] 3 (gates in fence) [3.1.1(c)] that it specifically states Paragraph 2.1.2 to 2.1.7 must be complied with in relation to gates, yet in [paragraph] 4.1 (windows in pool fences), this standard is not applied. In fact, [paragraph 4.1.1(a)] stating that a window must not be less than 1000mm, would be impossible to comply with if you applied [paragraph] 2.1.6 to it. If paragraph 2.1.6 was meant to be applied to [part] 4, it would be stated in the text, as it is in [part] 3.”

Authority

- 3.2. The authority submits:
 - 3.2.1. “...[W]hile the submitted plans indicated that the window forming part of the pool barrier would comply with Paragraph 4.1 of F9/AS1, the [authority] was not satisfied on reasonable grounds that the barrier would continue to comply once the building was in use. From the [authority’s] perspective, it was highly likely that furniture or other objects (‘projections’) would be placed beneath or near the window.”
 - 3.2.2. “For clarity, the [authority’s request for information] could also have referenced Paragraph 2.1.6 of F9/AS1, which requires that no projections that would assist climbing be located within 1200mm of the top of the barrier. Given the likelihood of furniture or other climbable objects being placed beneath the window, the [authority] was not satisfied on reasonable grounds that the proposed work would comply with Clause F9.3.3.”
 - 3.2.3. In response to the second request for information, the authority received a “floor plan showing furniture layout within the lounge. While no objects were shown directly beneath the window, a bookshelf was indicated adjacent to the window, although no dimensions were provided.”

- 3.2.4. “The bracing plan included in the dwelling consent...identifies approximately 700mm from the end wall to the bifold window frame, which is the location where the bookcase is shown. Given the likelihood that furniture or other climbable objects may be placed within 1200mm of the top of the barrier and in close proximity to the barrier wall, the [authority] was not satisfied on reasonable grounds that the proposed building work would comply with Building Code Clauses F9.3.3 or F9.3.4(b).”

Designer

- 3.3. The designer did not make any submissions.

4. Discussion

The legislation

- 4.1. Section 17 provides that all building work must comply with the Building Code to the extent required by the Act (regardless of whether a building consent is required for that work).
- 4.2. Clause F9 is the relevant Building Code clause that the pool barrier in this case must comply with. I have set clause F9 out in full in Appendix A and discussed how it is structured below, as this is key to understanding its application in this case.
- 4.3. The objective of clause F9 is to prevent injury or death to young children involving residential pools, and the functional requirement is that pools⁶ “must have means of restricting access that prevents unsupervised access by a child under 5 years of age.”
- 4.4. The five performance criteria in clauses F9.3.1 to F9.3.5 comprise two general performance clauses applicable to all residential pools, followed by three specific clauses pertaining to certain situations or types of barriers (which are aimed at addressing the particular risks associated with these):
- 4.4.1. clauses F9.3.1 and F9.3.2 contain the general requirements for a pool to have physical barriers restricting access by unsupervised young children, and for barriers to surround the pool (or cover it in the case of a small heated pool)
- 4.4.2. clause F9.3.3 requires a barrier surrounding a pool to have no permanent objects or projections on the outside that could assist children in negotiating the barrier, and sets out requirements for gates

⁶ The functional requirement Clause F9.2 applies to residential pools “with a maximum depth of water of 400mm or more that are filled or partly filled with water”.

- 4.4.3. clause F9.3.4 relates to buildings forming part or all of a pool barrier, with requirements for doors and windows opening to the pool area
- 4.4.4. clause F9.3.5 sets out requirements for covers provided as barriers to small heated pools.
- 4.5. A pool barrier may be a combination of different parts or types of barriers (as it is in this case). Each part of the barrier must comply with the performance requirements applicable to that type of barrier, but is not required to comply with clauses or subclauses that have no application or relevance. In this way the performance clauses establish different criteria depending on how a pool barrier is formed.
- 4.6. The question therefore arises as to which particular performance clauses apply to the part of the barrier at issue in this case (ie the wall of the house with the bi-fold window).

Applicable clauses of F9

- 4.7. The two general clauses (F9.3.1 and F9.3.2) must be satisfied as they apply to all pools. Clause F9.3.5 is not relevant as the pool is not a small heated pool nor the barrier a cover.
- 4.8. Clause F9.3.4 specifically deals with pool barriers formed by, or partly by, a building with doors or windows opening to the pool area. Subclause (a) relates to doors and is not relevant in this instance. Subclause (b) provides:
 - F9.3.4** Where a *building* forms all or part of an *immediate pool area* barrier,—
 - ...
 - (b) windows opening from a building into the *immediate pool area* must be constructed or positioned to restrict the passage of children.
- 4.9. The authority's position is that clause F9.3.3 must also be met (in addition to clause F9.3.4), ie the barrier "must have no permanent objects or projections on the outside that could assist children in negotiating the barrier". The second part of clause F9.3.3, relating to gates, is not relevant.
- 4.10. In my view, the wording of clause F9.3.3 does not logically apply when the barrier takes the form of a building. In that context, the meaning of the 'outside' of the barrier is unclear. The authority appears to interpret the outside of the barrier as being the internal face of the building wall.
- 4.11. I consider clauses F9.3.3 and F9.3.4 address distinct physical configurations rather than operating as cumulative requirements. Clause F9.3.3 is directed at free-standing or purpose-built barriers, and addresses the presence of permanent objects or projections on the outside of such barriers that may enable a child to climb or otherwise negotiate them. By contrast, clause F9.3.4 recognises that building elements such as doors and windows introduce different access risks to those presented by a conventional barrier, and it therefore sets specific

requirements (such as the focus in subclause (b) on the construction and position of openable windows to restrict the passage of children).

- 4.12. I conclude that clause F9.3.3 has no application in this case, therefore it is not required to be complied with. The building wall with the bi-fold window will comply with clause F9 if it satisfies the requirements in clauses F9.3.1, F9.3.2, and F9.3.4(b).

Acceptable Solution F9/AS1

- 4.13. One means of establishing compliance with the provisions of the Building Code is compliance with an Acceptable Solution.

- 4.14. Part 4 of F9/AS1 concerns windows and doors in building walls that form a pool barrier (or part of a barrier). The paragraph of F9/AS1 at issue in this case is 4.1, which provides:

4.1 Windows in the building wall

- 4.1.1 Where there is a window that can open above and within 2400 mm vertically of the immediate pool area the window shall have either:

- a) The lower edge of the opening no less than 1000 mm above the floor inside the building with no projections underneath of more than 10 mm, or
- b) A restrictor limiting the size of the opening such that a 100 mm diameter sphere cannot pass through, or
- c) A permanently fixed screen over the opening that a 100 mm diameter sphere cannot pass through.

- 4.15. These measures address the requirement in clause F9.3.4 that windows be 'constructed or positioned' to restrict the passage of children by setting a minimum height above the floor or incorporating features that restrict the size of the opening.

- 4.16. The authority has also raised paragraph 2.1.6 in its submissions, which states:

- 2.1.6 There shall be no ground features or objects outside a pool barrier within 1200 mm of the top of the barrier that would assist a child in climbing. Figure 2 gives acceptable methods for evaluating this requirement.

Application of F9/AS1 to the bi-fold window

Paragraph 4.1.1

- 4.17. The bi-fold window is a window that can open above and within 2400mm vertically of the 'immediate pool area', therefore it comes within paragraph 4.1.1 of F9/AS1.⁷

⁷ 'Immediate pool area' is defined in section 7 of the Act as meaning "the land in or on which the pool is situated and so much of the surrounding area as is used for activities carried out in relation to or involving the pool". In this case, the bi-fold window is approximately 1220mm vertically above the immediate pool area.

4.18. The owners consider sub-paragraph 4.1.1(a) applies, which requires:

4.18.1. the “lower edge of the opening” of the window to be “no less than 1000 mm above the floor inside the building”; and

4.18.2. “no projections underneath [the window] of more than 10 mm”.

4.19. There is no dispute between the parties that the lower edge of the opening of the bi-fold window is no less than 1000mm above the floor inside the house (at approximately 1070mm). The issue is the requirement that there be no *projections* underneath the window.

4.20. The word ‘projections’ is not defined in F9/AS1. Determination 2021/024 noted ‘projections’ (in the context of clause F9.3.3) is also not defined in the Building Code or the Act, stating:⁸

Clause F9.3.3 requires the barrier to have no permanent objects or projections on the outside that could assist children in negotiating the barrier. The term “projections” is not defined in the Building Code or the Act. However, the ordinary meaning of “projection”, is “an object which projects or extends beyond the adjacent surface; a projecting part or thing”.⁹ The High Court considered the meaning of “projections” in *Spiller v Hastings District Council*, where the court stated:¹⁰

I agree ... that the struts are projections in the way that word is commonly used, as being a part or thing which extends outwards beyond a prevailing line or surface.

4.21. In this case, the owners have advised there are no projections beneath the bi-fold window. Nor are there any projections underneath the window shown on any of the plans provided to the Ministry by the parties.

4.22. If the authority’s interpretation is correct and moveable furniture and appliances are ‘projections’, then paragraph 4.1.1(a) would be rendered redundant as it could never be met. I agree with the owners that Acceptable Solutions must be able to be relied on in accordance with their stated provisions. Interior furniture is no different from outdoor furniture or other moveable items outside an immediate pool area. The Building Code regulates buildings and building features; in the case of a residential pool it is the barrier that is being regulated, not the potential placement of furniture and other moveable items.¹¹

Paragraph 2.1.6

4.23. The authority also say paragraph 2.1.6 is not met – that there be “no ground features or objects outside a pool barrier within 1200mm of the top of the barrier

⁸ Determination 2021/024 *Regarding the compliance of a proposed pool barrier incorporating an existing boundary fence* (29 October 2021) at [5.18].

⁹ Definition of “projection”, Oxford English Dictionary, oed.com (25 February 2021) meaning 3(a).

¹⁰ *Spiller v Hastings District Council* [2013] NZHC 1444 at [9].

¹¹ These items are objects; paragraph 4.1.1(a) only applies to projections and does not refer to objects.

that would assist a child in climbing” – because the owners intend to place a bookshelf in the corner of the room nearest the window, which is approximately 700mm from the bi-fold window.

- 4.24. However, as with clause F9.3.3, I do not consider paragraph 2.1.6 applies to the inside of a building when a building wall forms part of a barrier. The wording of paragraph 2.1.6 does not logically fit, given it refers to the ‘outside’ of the barrier, and the ‘top of the barrier’.
- 4.25. In addition, the structure and wording of F9/AS1 indicates that part 4 sets out requirements pertaining to building walls, and that part 2 (including paragraph 2.1.6) is inapplicable:
- 4.25.1. Paragraph 2.1.1 is a general statement that a barrier can be a fence but may also take other forms of construction, and that a wall of a house or other building may form part or all of a barrier. The subsequent paragraphs in Part 2 are general requirements for barriers (and barriers on a property boundary), but are not relevant to a barrier which is formed by a building wall.
- 4.25.2. All of the six illustrations in Figure 2 (which paragraph 2.1.6 refers to as giving acceptable methods for evaluating the requirement not to have ground features or objects within 1200mm of the top of the barrier) show a freestanding barrier with either the ground profile relative to the barrier, or trees or plantings; none of the illustrations depict a building wall.
- 4.25.3. There is no equivalent of paragraph 2.1.6 in part 4, and part 4 does not require that other paragraphs in part 2 are complied with (compared with part 3 ‘Gates in pool barriers’, which in paragraph 3.1.1(c) specifically refers to those paragraphs in part 2 that a gate must comply with, as noted by the owners).
- 4.26. Given that the requirements in part 2 are not explicitly referred to or incorporated in part 4 (unlike part 3), it is clear they do not apply.
- 4.27. Requiring paragraph 2.1.6 to be met in relation to the bi-fold window opening would create a conflict with paragraph 4.1.1(a). Paragraph 2.1.6 does not allow ground features within 1200mm of ‘the top of the barrier’, while paragraph 4.1.1(a) expressly allows the lower edge of the opening to be at 1000mm above the floor inside the building. That being the case, as the owners observe, compliance with 2.1.6 would be impossible unless the window was at 1200mm, with the result that paragraph 4.1.1(a) would have no practical effect.
- 4.28. I conclude that where a pool barrier incorporates a building wall with a window, the relevant requirements of F9/AS1 are in paragraph 4.1.1, and paragraph 2.1.6 does not apply. As the part of the pool barrier at issue in this case satisfies paragraph 4.1.1(a), it therefore complies with F9/AS1.

Conclusion

4.29. I conclude the bi-fold window in the wall of the house forming the pool barrier meets the requirements of F9/AS1 and compliance with clause F9 has been achieved.

4.30. As the owners have acknowledged, they have an ongoing obligation under section 162C(4) to ensure the pool barrier remains compliant. This ongoing obligation is in respect of the entire pool barrier, not only the part considered in this determination. I also note that under section 162D the authority is required to carry out periodic inspections of residential pools within its jurisdiction once every three years.

5. Decision

5.1. In accordance with section 188 of the Building Act 2004, I determine the part of the proposed pool barrier comprising a wall of the house with a bi-fold window, complies with clause F9.

Signed for and on behalf of the Chief Executive of the Ministry of Business, Innovation and Employment on 27 March 2026.

Peta Hird

Lead Determinations Specialist

Appendix A

Clause F9 of the Building Code

Objective

F9.1 The objective of this provision is to prevent injury or death to young children involving *residential pools*.

Functional requirement

F9.2 *Residential pools* with a maximum depth of water of 400 mm or more that are filled or partly filled with water must have means of restricting access that prevents unsupervised access by a child under 5 years of age.

Performance

F9.3.1 *Residential pools* must have or be provided with physical barriers that restrict access to the *pool* or the *immediate pool area* by unsupervised young children (ie, under 5 years of age).

F9.3.2 Barriers must either—

- (a) surround the *pool* (and may enclose the whole or part of the *immediate pool area*); or
- (b) in the case of a small heated pool, cover the pool itself.

F9.3.3 A barrier surrounding a *pool* must have no permanent objects or projections on the outside that could assist children in negotiating the barrier.

Any gates must—

- (a) open away from the *pool*; and
- (b) not be able to be readily opened by children; and
- (c) automatically return to the closed position after use.

F9.3.4 Where a *building* forms all or part of an *immediate pool area* barrier,—

- (a) doors between the *building* and the *immediate pool area* must not be able to be readily opened by children, and must either—
 - (i) emit an audible warning when the door is open; or
 - (ii) close automatically after use:
- (b) windows opening from a building into the *immediate pool area* must be constructed or positioned to restrict the passage of children.

F9.3.5 Where a cover is provided as a barrier to a *small heated pool*, it must—

- (a) restrict the entry of children when closed; and
- (b) be able to withstand a reasonably foreseeable load; and
- (c) be able to be readily returned to the closed position; and
- (d) have signage indicating its child safety features.

* Note there are limits on application of F9.3.1 and F9.3.2(b) in relation to small heated pools which have not been reproduced here.