Our Ref: ID 2176
Your Ref: PP-2021-7404 Ref-2505

28 November 2023

Douglas Cunningham
Department of Planning and Environment
Locked Bag 5022
Parramatta NSW 2124

email: douglas.cunningham@planning.nsw.gov.au
CC: shelly.stingmore@one.ses.nsw.gov.au

Dear Douglas,

Planning Proposal for 161 Darley Street, West Mona Vale

Thank you for the opportunity to provide comment on the Planning Proposal for 161 Darley Street, West Mona Vale. It is understood that the planning proposal seeks to:

- Remove of existing dwellings
- Construct two apartment buildings with 18-20 apartments each
- Construct three two-storey townhouses

The NSW State Emergency Service (NSW SES) is the agency responsible for dealing with floods, storms and tsunami in NSW. This role includes, planning for, responding to and coordinating the initial recovery from floods. As such, the NSW SES has an interest in the public safety aspects of the development of flood prone land, particularly the potential for changes to land use to either exacerbate existing flood risk or create new flood risk for communities in NSW.

The consent authority will need to ensure that the planning proposal is considered against the relevant Ministerial Section 9.1 Directions, including 4.1 – Flooding and is consistent with the NSW Flood Prone Land Policy as set out in the Flood Risk Management Manual 2023 (the Manual) and supporting guidelines, including the Support for Emergency Management Planning. Key considerations relating to emergency management are outlined in Attachment A.

In summary we:

- **Note** that the existing site is designated as medium and low flood risk and forms part of the overland flow path[1].

[1] McCarrs Creek, Mona Vale and Bayview Flood Study, 2017, page 74

STATE HEADQUARTERS
93 - 99 Burelli Street, Wollongong 2500
PO Box 6126, Wollongong NSW 2500
P (02) 4251 6111
F (02) 4251 6190
www.ses.nsw.gov.au
ABN: 88 712 649 015

- **Note** the proposed mitigation measures to reduce flood depths for downstream properties.
- **Recommend** considering undertaking sensitivity modelling for the case of localised mounding failure in diverting flow from neighbouring property and recommend discussing with the Department of Planning and Environment – Environment and Heritage Group (DPE EHG) regarding potential impacts on neighbouring properties.
- **Recommend** ensuring that driveway entry to the under-croft parking and garages is situated above the PMF to reduce risk to life and property.
- **Recommend** seeking further information to understand the risk to life and property, including the maximum length of time for inundation or isolation of the site.

You may also find the following Guidelines, originally developed for the Hawkesbury Nepean Valley and available on the NSW SES website useful:

- Reducing Vulnerability of Buildings to Flood Damage
- Designing Safer Subdivisions
- Managing Flood Risk Through Planning Opportunities

Please feel free to contact Claire Flashman via email at rra@ses.nsw.gov.au should you wish to discuss any of the matters raised in this correspondence. The NSW SES would also be interested in receiving future correspondence regarding the outcome of this referral via this email address.

Yours sincerely

Elspeth O'Shannessy
Manager, Emergency Risk Assessment
NSW State Emergency Service

ATTACHMENT A: Principles Outlined in the Support for Emergency Management Planning Guideline[2]

Principle 1 Any proposed Emergency Management strategy should be compatible with any existing community Emergency Management strategy.

Any proposed Emergency Management strategy for an area should be compatible with the evacuation strategies identified in the Northern Beaches Flood Emergency Subplan, 2021.

Principle 2 Decisions should be informed by understanding the full range of risks to the community.

Decisions relating to future development should be risk-based and ensure Emergency Management risks to the community of the full range of floods are effectively understood and managed.

The rear of the existing site is designated low and medium risk[3] with some areas subject to H3 hazard[4] in a PMF event. This flood hazard is unsafe for vehicles, children and the elderly and will need to be managed.

Principle 3 Development of the floodplain does not impact on the ability of the existing community to safely and effectively respond to a flood.

The ability of the existing community to effectively respond (including self-evacuating) within the available timeframe on available infrastructure is to be maintained. It is not to be impacted on by the cumulative impact of new development.

Principle 4 Decisions on redevelopment within the floodplain does not increase risk to life from flooding.

Managing flood risks associated with High Flood Islands requires careful consideration of development type, likely users, and their ability respond to minimise their risks. This includes consideration of:

- Isolation – There is no known safe period of isolation in a flood, the longer the period of isolation the greater the risk to occupants who are isolated.
- Secondary risks – This includes fire and medical emergencies that can impact on the safety of people isolated by floodwater. The potential risk to occupants needs to be considered and managed in decision-making.

---

[2] NSW Government. 2023. Principles Outlined in the Support for Emergency Management Planning Guideline

[3] McCarrs Creek, Mona Vale and Bayview Flood Study, 2017, page 74

[4] McCarrs Creek, Mona Vale and Bayview Flood Study, 2017, page 80

- Consideration of human behaviour – The behaviour of individuals such as choosing not to remain isolated from their family or social network in a building on a floor above the PMF for an extended flood duration or attempting to return to a building during a flood, needs to be considered.

When evaluating potential impact, the risk of isolation, secondary risks and human behaviour should be considered. There is no known safe period of isolation in a flood, though the longer the period of isolation, the greater the risk to occupants. Risk to occupants may be compounded by secondary risks such as fires or medical emergencies. There is also the risk that people will not follow emergency management plans, for example they may refuse to remain isolated from family for an extended duration. As both driveway access routes become flooded in a 1% AEP event[5] residents are likely to become isolated.

Emergency services are also exposed to greater risks than if flood-free access was available. This unnecessarily exposes emergency service personnel to flood situations which may lead to the injury or death. In recognition of this possibility, emergency services are under an increasing demand to consider the safety of personnel. Each circumstance must be subject to an individual risk assessment at the time. If, after conducting a risk assessment of an incident, a Commander or team leader is unsatisfied with the level of risk involved, the response will be delayed until the risk can be reduced or is no longer present.

Principle 5 Risks faced by the itinerant population need to be managed.

Any Emergency Management strategy needs to consider people visiting the area or using a development.

Principle 6 Recognise the need for effective flood warning and associated limitations.

An effective flood warning strategy with clear and concise messaging understood by the community is key to providing the community an opportunity to respond to a flood threat in an appropriate and timely manner.

Principle 7 Ongoing community awareness of flooding is critical to assist effective emergency response.

In terms of the current proposal, the flood risk at the site and actions that should be undertaken to reduce the potential risk to life should be clearly communicated to all site users, for example through signage and emergency drills, during and after the construction phase.

[5] Appendix E – Stormwater Management Strategy, Table 2, Page 11