

Hydrant and water supply requirements for developments within the standard QFR response area

National Construction Code (NCC), clause E1D2 (1)¹ requires a fire hydrant system must be provided to serve a building–

- a) having a total floor area greater than 500 m²; and
- b) where a fire brigade station is -
 - (i) no more than 50 km from the building as measured along roads; and
 - (ii) equipped with equipment capable of utilising a fire hydrant.

Queensland Fire and Rescue (QFR) interpret ‘a fire brigade station is equipped with equipment capable of utilising a fire hydrant’ to mean the fire brigade station is staffed by:

- QFR permanent fire-fighters, or
- QFR Auxiliary fire-fighters, or
- A combination of 1 and 2, or
- Rural fire officers whose appliance is:
 - (i) Capable of connecting to hydrant system infrastructure required to protect the building; and
 - (ii) Able to provide the flows and pressures required, as per the tables in Section 2 of AS 2419.1:2021, for the building to be protected.

Where a fire hydrant system is required to be installed to serve a building with a total floor area greater than 500 m² and where a fire brigade is available to attend as determined by the interpretation above, then the water supply requirements for hydrant systems should meet AS 2419.1:2021.

If an existing bore is proposed for the water supply, QFR recommend the bore water be fed to a storage tank fitted with dual booster pumps and a large bore suction connection from the tank.

Alternatively, consideration could be given to adopting a performance solution approach.

¹ NCC 2022 clause E1D2 (1)