Re: Proposed District Plan Change G: Aokautere urban growth; and the future use of Adderstone Reserve

Aokautere Urban Growth 22nd November 2023

With a growing population Palmerston North does need to build a lot more houses in the near future but this should be in a sustainable way.

While I support urban growth on the unproductive clay soils of Aokautere rather than the fertile, agriculturally productive land north of the city, I am concerned about the degree of intensification proposed. The level of intensification is at a level never seen before in the city on land that is quite distant from the city and above bush reserves that are of high ecological and recreational value.

Impact of surface water on the surrounding land

With climate change we are seeing a dramatic increase in both the intensity and frequency of flooding in the Manawatu and throughout New Zealand. When we moved to Moonshine Valley in 1994 the Mangaotane stream (Bryant's stream) would flood every two to three years. Now it floods several times each year with a dramatic increase in erosion of the banks and deposition of sediment in the stream. One only need to walk into the entrance of Moonshine Valley Reserve to see the huge impact of this increased flooding. This valley is a microcosm of what is happening in all the streams and tributaries that flow into the Manawatu river.

The increased sedimentation in the last few years has been exacerbated by the housing developments occurring on the surrounding land that drains through gullies into Mangaotane stream. The stream has Koura (freshwater crayfish), Kakahi (freshwater mussels), Giant Kokopu and Longfin eel. My greatest concern with the proposed Aokautere Urban Growth Plan is the impact of storm water run-off into Moonshine Valley Special Area and the impact on the land and the stream. Urban development brings with it a significant increase in concrete and asphalt surfaces with increased water run-off in storm events. While the proposed plan includes mitigation strategies these seem seriously inadequate.

- Section boundaries should be at least 15 m back from the edge of the gullies as in the Turitea Valley not 5 m. I note these measures are strongly supported by Mr Hudson and the Geotechnical, Stormwater and Urban Design reports.
- The proposed ponds to capture the water appear to be too few and not large enough in size to really capture large volumes of water in storm events
- The size of sections close to the edge of the gullies is too small
- Land overlooking Moonshine Valley should be retain Rural-Residential zoning
- There is no place for three storey housing in this new development as the land cannot sustain that intensity of development.
- I also endorse the use of swales to control storm water but the maintenance of these should lie with Council not residents

• All measure should be taken during housing development to minimize any damage to existing native bush and to reduce the impact of sediment flowing into Magaotane/Bryant's stream and the surrounding tributaries.

Intensity of housing and flow on effects

The plan envisages a build of around 1050 new dwellings in a mixture of single through to three-storey houses at a density lower than any of the built-up areas within the city. While intensification of housing in the central part of a city is desirable to create a vibrant and sustainable city doing this on the outskirts of the city is moving in an unstainable direction

- There will be a dramatic increase in car trips per day along Aokautere and Sommerville Drives into the city and put huge traffic pressure on Fitzherbert Avenue
- The distance (6-9 km) from the heart of the city for much of the proposed development would make it one of the most car-dependent suburbs in the city
- More car traffic will increase CO₂ emissions for the city, which is counter to the current sustainability goal of PNCC.
- While the plan includes arteries for public bus transport unless the service is frequent, relatively cheap and convenient to use, residents will take the easy option of private car usage as they already do throughout much of the city.
- For those choosing to use a cycle as a transport option the increase in traffic will pose a greater risk to safety
- Housing intensification at this level on the outskirts of the city is going to increase our greenhouse gas emissions when we should be moving to decrease them.
- The plan is counter to the sustainability goals of *He Rautaki Tāone Tautaiao Eco City Strategy 2021-2031*.

By way of background, I have lived in Moonshine Valley for close to 30 years and have been involved in conservation there for all of that time. Consequently, I know the valley very well and the changes that have occurred over this time through interventions by the community to restore the reserves but am also very familiar with the devastating impacts of storms, floods and drought. I do not want to see negative impacts from intense urban development on the hills around and above the valley.

Unfortunately I am out of town for the hearing so can only be heard through this submission (modified since the original was submitted)

Yours sincerely Barry Scott 95 Moonshine Valley Road, Aokautere