

**Before Independent Commissioners Appointed by the Canterbury Regional Council and Selwyn District Council**

**In the matter of**            The Resource Management Act 1991

**And**

**In the matter of**            Applications by **Fulton Hogan Limited** for all resource consents necessary to establish, operate, maintain and close an aggregate quarry (**Roydon Quarry**) between Curraghs, Dawsons, Maddisons and Jones Roads, Templeton

---

**REBUTTAL EVIDENCE OF DAVID COMPTON-MOEN ON BEHALF OF  
FULTON HOGAN LIMITED**

**LANDSCAPE**

**DATED: 21 OCTOBER 2019**

---

**Counsel Acting: David Caldwell**  
Email: david.caldwell@bridgesidechambers.co.nz  
Telephone: 64 21 221 4113  
P O Box 3180  
Christchurch 8013

## **Introduction**

1. My name is David Compton-Moen and my area of expertise is Landscape and Visual Impact Assessment.
2. I have previously provided a written brief of evidence in relation to the Roydon Quarry Proposal. That evidence is dated 23 September 2019. I confirm my qualifications and experience as set out in paragraph 4 of that evidence.
3. I also confirm I have read and agree to comply with those parts of the Environment Court Practice Note that bear on my role as an expert witness, in accordance with paragraph 6 of my earlier evidence.

## **Scope**

4. In my rebuttal evidence I address the evidence of the following witnesses:
  - (a) *Abigail Alice Smith, Christchurch City Council, Landscape and Visual Amenity Effects*
5. I will also identify matters not discussed in my primary evidence but which are raised by other witnesses and with which I agree.

## **Evidence of Abigail Alice Smith, Christchurch City Council, Landscape and Visual Amenity Effects**

6. In the evidence of Ms Smith, there are several references to the effects of the grass landscape bunds themselves being adverse and changing the rural character of the receiving environment. The bunds are to have a relatively shallow external slope of 1 in 3 to provide a more gentle, natural appearance, which will support better grass growth. The shape of the slopes is likely to have a degree of variability which is considered positive to reduce any potential uniformity of the slopes. Initially plantings were to be positioned on the slope but following comments from SDC it has been agreed to plant at the base of the slope. This allows the plants to be established prior to the installation of the grassed bunds.
7. I do not consider the bunds will have an adverse effect on the character.<sup>1</sup> There will be a degree of change but the change is considered acceptable. Bunds are not out of place in the rural environment. There are a number of

---

<sup>1</sup> Evidence of Ms Abigail Smith, paragraph 5.6 – '*In my opinion, earth bunds are not an expected feature in the rural open plains landscape, they are a un-natural modified feature that signals an activity is occurring behind them*'.

existing bunds and earthworks in the immediate area, most notably along the state highway where grass mounds have been used for noise mitigation for adjacent residents.

8. Ms Smith also notes effects resulting from the removal of existing shelter belts post-rehabilitation revealing alterations to the landscape.<sup>2</sup> Shelter belts can currently be removed as of right and the changes to the topography once rehabilitated are considered acceptable. There are numerous examples in close proximity to the proposal where earthworks have been undertaken, either for stormwater detention basins or other quarries. The photo below is of the stormwater detention basin at the intersection of Jones-Pound Road. I do not consider that the post-rehabilitated slopes will require permanent screening with the visual effects associated with the modified, rehabilitated slopes being acceptable.



**Figure 1: Photo of the stormwater detention basin at the Jones-Pound Road intersection**

9. Several suggestions have been made to the composition of the landscape planting, length of the establishment period and the staging of the excavation

---

<sup>2</sup> Evidence of Ms Abigail Smith, paragraph 5.5 – ‘There is a risk that the removal of established shelter belts surrounding the proposed quarry could expose the alterations to the topography resulting from extraction activities.’

works.<sup>3</sup> I consider that no changes are necessary to the current proposal. It is based on recognised good practice and past experience planting in similar environments. The following comments are made:

- (a) The 3 rows of staggered planting, using a mix of exotic and native species of varying heights and forms, are considered appropriate for the location to achieve a balance between visual, dust mitigation and landscape effects. The different plants, together with the bunds, will form a visual screen into the site and it is not considered necessary to extend the width of the shelter belt out to 10m as suggested by Ms Smith's evidence.<sup>4</sup> The example shown in paragraph 38 of my evidence in chief shows the plantings at the Pines Wastewater Treatment Plant which were 3 rows planted over a 4m wide landscape strip. Similarly, the second set of photos in paragraph 38 of that evidence show a single row of pittosporum trees on Miners Road, forming a dense screen and, with the grass bund, preventing views into the site.
- (b) Changing the staging of excavation or preventing the commencement of quarrying operations until plants are 3m high will not result in any change to visual effects for the residents of Templeton. The closest residents in this direction are over 700m away and are largely already screened by existing (off site) shelter belts. The 3m high grass bunds around the entire site will prevent views of any quarrying operations and are not reliant on the height of the boundary planting.<sup>5</sup>
- (c) The recommendation to have an 80% grass cover is considered acceptable and likely to occur in any case.<sup>6</sup>
- (d) Root trainers have been specified as they have the best chance of survival on these types of projects and large-scale road projects. While large specimens may provide greater instant effect, smaller trees quickly establish, catch up and pass larger species as they adapt more readily to a new environment.<sup>7</sup>

---

<sup>3</sup> Evidence of Ms Abigail Smith, paragraphs 8.2, 8.3, and 8.4 – *Mitigation required to address Landscape Character and Visual Amenity Effects*.

<sup>4</sup> Evidence of Ms Abigail Smith, paragraph 8.2a - Recommending a 10m wide planting strip.

<sup>5</sup> Evidence of Ms Abigail Smith, paragraph 8.2b, 9.1 and 12 – Recommending where there are no existing shelter belts that no quarrying activity is undertaken within 200m of any road boundary until mitigation planting has reached a minimum height of 3m and provides full screening.

<sup>6</sup> Evidence of Ms Abigail Smith, paragraph 13f – grass cover.

<sup>7</sup> Evidence of Ms Abigail Smith, paragraph 8.4c - use of larger tree grades.

- (e) The proposed plantings will establish relatively quickly with irrigation, in less than 10 years, with the key establishment period being the first two years. The consent holder is then required to maintain the plantings for the life of the consent, not just the first two years as referred to in Ms Smith's evidence.<sup>8</sup> A photo report will be provided to SDC annually to ensure compliance with the consent conditions. Extending the establishment period out to 5 years is not considered necessary as Fulton Hogan will retain ownership and maintenance of the planting. Establishment periods (defects period) are used when a site is to be handed over to a council or a site owner that has not actually undertaken the work. In this example, a 5-year establishment period is somewhat arbitrary as the planting work is being undertaken by the consent holder and they will continue maintaining the health and well-being of the plants for the duration of the quarry's life. The suggested extension of the requirement for irrigation out to 5 years may have some landscape benefits.
- (f) Mulching of the landscape strips is not considered necessary based on previous experience. Pit planting, with rabbit protection, into grass is considered an acceptable method to establish plantings as highlighted in the photos shown in paragraph 38 of my evidence in chief.

### **Other Matters**

10. The evidence of Mr Westley of Southern Woods mentions the attributes of a shelter belt which assists with mitigating dust spread. I consider that the proposed planting design is consistent with Mr Westley's intentions and does not require modification.
11. The evidence of Ms Conlon mentions that given planting and bund formation are independent of each other that planting could occur as soon as possible, to provide maximum establishment and growth time before quarry activities occur. I agree that the timeframe could be amended to require planting in the first planting season following consent being granted.

### **David Compton-Moen**

21 October 2019

---

<sup>8</sup> Evidence of Ms Abigail Smith, paragraph 7.5 – Long term monitoring and maintenance of landscape bunds and planting post issuing of the Practical Completion Certificate.