AgResearch responses to the OIA request from Claire Bleakley October 2012

1. **Erbitux cattle 1st Quarter 2010 (Annual report 2010) to 4th Quarter 2010 Group 46 -50 (p.10) (Annual report 2011).**
   - **1.1. How many Erbitux embryo transfers there were per run and how many cows were impregnated?** *There was an average of 23 embryos transferred per run with a range of 8 to 34.*
   - ***1.2.*** **Were all the surrogates recipient cows non-transgenic cattle?** *Yes, all the surrogate recipient cows were non-transgenic cattle.*
   - **1.3. How many recipients were non transgenic?** As above, a*ll were non-transgenic.*
   - **1.4. How many recipients were transgenic?** *As above, none were transgenic.*
   - **1.5. What transgenic line were they**? *Refer above, therefore not applicable.*

2. **Beta LactoGlobulin knockdown cattle; it states that there were 2 embryo transfer runs undertaken in 14 & 16 December groups 53 & 54 in the 1st quarter of 2011 (p.13), also in the 2nd quarter 2011 there were further group transfers of ET 55/56. (p.14).**
   - ***2.1.*** **How many embryos were transferred in each of the four runs?** *The table below shows the number of embryos transferred in each of the four runs:*

Run	Number of embryos transferred
Gp53	25
Gp54	28
Gp55	27
Gp56	29

   - ***2.2.*** **How many surrogate recipient cows were impregnated?** *64 recipients were available for ET with ET numbers for each group above. Only 1 recipient from these groups held a pregnancy past day 140.*
   - **2.3. How many recipients were non-transgenic?** *All were non-transgenic.*
   - **2.4. How many recipients were transgenic?** *As above, none were transgenic.*
   - **2.5. What transgenic line were they?** *Refer above, therefore not applicable.*

3. **I note that on cow 06047-hLF line, aborted twice at 4 months (Annual report 2012, p.10). Report outlines it once at 2nd Q 2011 p.14 and the other 3rd Q 2011.**
   - **3.1. Is this the same episode written down twice or two different impregnation events?** *From our records yes this is the same event twice, Q2 2011 is actual period.*
   - **3.2. Were they embryo transfers that were impregnated into 06047 or was she naturally mated?** *She was naturally mated.*
   - **3.3. Was she a hLF transgenic cow? If not what was she?** *Yes, she was a hLF transgenic cow.*

4. **How many bulls are sterile or produce no viable semen in each of the Casein +, Beta LactoGlobulin -, hLF, hFSH, hMBP transgenic lines and at what generation?** *The table below shows the number of bulls who are sterile or produce no viable semen:*

Line	Number of bulls
Casein	1
Beta-lactoglobulin	0
hLF	0
hFSH	0
hMBP	0

4.1. Are the F1 generation bulls sterile? *No, the F1 bulls are not sterile.*
4.2. Are the F2 generation bulls sterile? *No, the F2 bulls are not sterile.*
4.3. Are the F3 generation bulls sterile? *No, the F3 bulls are not sterile.*
4.4. Was bull 09011 Casein + bull (p.13) 2011 annual report a bull from an ET transfer or natural mating? *He was from a natural mating.*
4.5. Was the bull's mother a transgenic cow? *Yes, the bulls mother was a transgenic cow.*
4.6. If so what transgene did she carry? *The Casein line.*
4.7. If not, was 09011 from a surrogate recipient cow? *Refer above, therefore not applicable.*
4.8. **Was 09011 the offspring of a natural mating with a transgenic bull?** *Yes, it was the offspring of a natural mating.*
4.9. Non-Transgenic bull? *No, it was a transgenic bull.*
4.10. If so what type of bull? *The Casein line.*
4.11. **Do any of the calves heifers and bulls show trans-gender genitalia?** *No, none of the calves show trans-gender genitalia.*