(海外・国内) 出張報告書(学生用)

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目的	Poster presentation and attending conference

## Summary of activities

First day of the conference, satellite meeting of Society for Reproduction and Fertility of UK was held in September 1<sup>st</sup>. Scientific program were consist of student prize session, postdoctor prize session, symposia, and lecture session. Broad fields of reproduction problems and future of artificial reproduction technologies including human and animals were presented by presentators from Europe and some Asia. Mainly, reproduction problems of human, such as infertility of men and women, diseases of ovaries, endometrium, and sperm were discussed.

From September 2<sup>nd</sup> to September 4<sup>th</sup>, World Congress of Reproductive Biology (WCRB) 2014 was started at Edinburgh International Conference Centre (EICC) (Fig. 1). WCRB was established in 2008 to provide a forum for basic and clinical reproductive biologists from all around the globe to meet and exchange cutting edge ideas and research findings. The WCRB 2014 is being organized by 6 international societies in partnership: Australia, China, Japan, Korea, USA and UK (Fig. 2 and 3). In this congress was hosted by the Society for Reproduction and Fertility in UK and 376 presentators and 408 delegates were attended to the conference from 35 countries and 5 continents. In addition, six plenary lectures, eight parallel symposium, six free oral communications, and 339 posters were presented.

The end day of conference was my poster session (Fig. 4 and 5). I presented new *in vitro* fertilization (IVF) system to establish an efficient system for bovine embryo production by IVF that can achieve stable normal fertilization and blastocyst developmental rates in any bulls without optimization of sperm

concentration in IVF medium. I believe that my study will contribute to the improvement of bovine IVF system for use of a small number of valuable sperm such as cryopreserved sperm from dead or sex-sorted sperm. Thus, my study will contribute to improvement of productivity of bovine embryos, dairy and beef industries.

Also, in oral presentation session, I had learnt interesting and valuable study for my study that Dr. Jinsong Li from China had presented for 'generation of mammalian haploid embryonic stem cells' and 'generation of genetically modified mice by oocyte injection of androgenetic haploid embryonic cells'. The research groups of Dr. Jinsong Li have been researched sex-chromosome transgenic mice and haploid stem cells of monkey. And research for identification of the gene for germline sex-determination in medaka by Mr. Toshiya Nishimura *et al.* also presented that sex determination for production of dimorphic gametes, sperm and oocytes. They demonstrated an oocyte-sperm switch gene, which was initially expressed in germ cells of indifferent gonad in both XX and XY embryos but totally disappeared during male development. These researches gave me the some clue to improve the low production of sex-predetermined embryos *in bovine* by modification of genes and mechanisms of sex determination. Since, I have been studied about the production of sex-determined embryos derived from X- or Y-chromosome sperm.

In presentation skills, it is now possible that I can present about my study and research using appropriate explain skills in English compared to before attending the conference. In particular, I learned how to explain research data using appropriate scientific words and sentences during poster presentation through procedures of presenting, inquiries and answers. Besides, I gained some ideas for my study from advices for my presentation, but also other presentations. First of all, I made network with foreign researchers (Fig. 6) and I achieved confidence that, when I communicate with foreigner in English who come from foreign countries.

I had remembered the meaningful sentence that chairman of WCRB 2014 said to audiences including me. "There are no strangers, just friends and collaboraters". After that I had heard presentators' presents and ideas, but also I had been expressed my opinions for their presentations. In addition, attending of world congress in this time gave me the chance to meet famous and young

scientists who studying reproductive biology from various countries.

Finally, I thank LP officers for coordination of my trip, Prof. Horiuchi for giving me opportunity to attend the international conference.



Fig. 1. EICC



Fig. 3. Six International Societies



Fig. 5. Poster presentation



Fig. 2. Conference hall



Fig. 4. View of poster session



Fig. 6. Dinner party

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