Working session. Revisiting the history of the Modern Synthesis.

University of Chicago, Nov. 10, 2014. 9am – 5 pm.

This working session is devoted to an ongoing international research project about *Revisiting the history of the Modern Synthesis*, led by John Beatty, Richard Burian, David Depew, Jean Gayon, Philippe Huneman and Edna Suarez.

Presentation.

The overall project has two objectives.

(1) Historical reconstruction of how the Modern Synthesis developed after about 1950 across various fields of biological research and was, in turn, altered by these fields.

(2) Transversal questions about the status of the Synthesis, yesterday and today, with a major concern for the meaning of "unification", "synthesis", etc.

(1) will pave the way for (2). Our conjecture, which supports the general intent of the collective work, is that the *disparate ways in which different domains impacted the Modern Synthesis over time reduced its unificatory power*.

Objective (1) will be fulfilled through a special issue in the *Journal of the history of biology*; the present workshop is the first stage of presentation of the materials that will constitute papers, with discussion of those materials aimed at improving the papers and fostering the overall coherence and unity of the projected special issue of *JHB*.

It is organised around the following Central question: Historical reconstruction of how the Modern Synthesis was developed across various fields of biological research and was, in turn, altered by these fields.

The structure of the issue and the workshop will be disciplinary.

Presenting the Modern Synthesis, Huxley wrote: "The time is ripe for a rapid advance in our understanding of evolution. Genetics, developmental physiology, ecology, systematics, paleontology, cytology, mathematical analysis, have all provided new facts or new tools of research. The need today is for a concerted attack and synthesis. If this book contributes to such a synthetic point of view, I shall be well content" (Huxley, *Evolution, the Modern Synthesis*, 942, p. 8). Our workshop deals with some of the disciplines that Huxley listed in 1942 and some others that became more closely connected to the Synthesis starting around 1950. We are interested in how these disciplines were influenced by the Synthesis, and how they, in turn, changed and challenged its intellectual identity.

Being a working session, this workshop only welcomes a limited audience. If you are interested, please register of time with Philippe Huneman (philippe.huneman@gmail.com)

We are grateful to Prof. Robert J. Richards and the Fishbein Center of the University of Chicago for kindly providing us with a conference room.

Tentative Schedule.

9.00-9.25. Jean Gayon (Paris). The idea of a Modern Synthesis and its evolution: a bibliometrybased approach.

9.25-9.50 John Beatty (Vancouver). The problem of creativity: what role for selection?

9.50-10.15 Richard Burian (Virginia Tech) Genetics

10.15-10.40 David Sepkoski (Berlin) Palaeontology

Break

11-11.25 Anya Plutynski (Saint-Louis) Speciation

11.25-11.50 Jean-Baptiste Grodwohl (Salvador de Bahia). Behaviour, evolution of sociality

Lunch Break

1.30 – 1.55 Philippe Huneman (Paris). Ecology, environment

1.55- 2.20 Edna Suarez (Mexcio). Molecular evolution

2.20- 2.45 Alan Love (Minnesota). Development

2.45- 3.15 Maureen O'Malley (Exeter). Microbiology Break

3.30-5 General Discussion

Sophie Pécaud (Paris) who is writing about Systematics, and Erika Millam, about sexual selection, are not able to attend, unfortunately. They'll send materials that will be discussed in the general discussion sessions.

Materials of the conference talks will be circulated on demand. Talks will be about 15-20 mn, with a 5-10 mn additional discussion for each.

Place: Tea Room; located on the same floor as the Fishbein Center (room 205) of the Social Sciences Research Building (1126 E. 59th St, Chicago).