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The X-Men and their networks of power

Ruth Barton: The X Club: power and authority in victorian science. Chicago: Chicago University Press, 2018, 604pp, $55.00 HB

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The X Club: Power and Authority in Victorian Science by Ruth Barton is a highly anticipated and very well researched account of the formation, rise to power, dominance and decline of what has been called the "most powerful coterie in late-Victorian science" (7). Drawing on a rich array of archival sources, including diaries and personal correspondence, the story of the nine friends who made up the dining club – George Busk, Edward Frankland, Thomas Hirst, Joseph Hooker, T.H. Huxley, John Lubbock, Herbert Spencer, William Spottiswoode, and John Tyndall – is told in meticulous detail. Yet, the book is more than a story of the X Club members; Barton gives deserved attention to a wide range of previously neglected collaborators, members of what she terms the wider 'X-network' including, crucially, non-scientific actors from the worlds of rational dissent, liberal theology and the universities. In so doing, we are able to understand, more clearly than ever before, the complex ways in which members of the X Club formed part of a wider cultural elite in mid-to-late nineteenth-century England.

The first three chapters (comprising Part One) focus on the origins and ambitions of the Club, considering the backgrounds and early careers of the individual members, and their broader networks of collaboration and patronage. Part Two examines the X Club in its established form with three more chapters focusing respectively on the Club's plans for organizing science, involving government and public money in science education and

research; and the ways in which they sought to claim cultural authority. The main body of the book is topped and tailed with an Introduction which presents the X Club, its members, the historiography and the aims of the book and a Conclusion seeking to identify distinct phases in the development and decline of the Club as well as key aspects of its programme and ambitions. Barton's central arguments are that scientific authority should be understood as a product of the interaction of inherited social status (birth) and scientific talent; that promoting the authority and independence of scientific men were the chief aims of the X Club; and that scientific naturalism should be thought of as a 'project' through which members sought naturalistic explanations for phenomena rather than as an explicit 'doctrine' (20).

Moreover, Barton is explicit from the start about her rejection of what she terms the 'heroic mode' of historical writing. She rightly highlights the inadequacy of a conception of historical causation which asserts that "a few men changed the world" (8). Instead, she seeks to underline the limitations of the X Club's power and influence as well as their successes. In doing this, Barton takes her cue from group biographies of women which, she claims, "are usually more interested in the ways in which their subjects are representative rather than world-changing; the experience of the subjects is used to understand the culture and conventions of their times" (6). To this end, her study sets out to "plac[e] the X-men in their larger scientific and cultural context" (9), "to move from microhistory to macrohistory and to become, also, a study of Victorian science and the place of science in Victorian culture" (7).

However, while Barton has certainly produced a richer, more integrated history of the X Club and their connections with the wider social and cultural elite of Victorian England, the book does not fulfil its promise to move from micro- to macrohistory. Barton rightly criticises historians who adopt the heroic approach for "ignor[ing] the conditions and movements that allowed, even enabled, particular actions or events to have large consequences" (8). And yet, in important ways her book does exactly this. Despite paying considerable attention to the social backgrounds of the X Club members, other crucial structural conditions which 'allowed' and 'enabled' the Club's influence are neglected. The extent to which the scientific authority of the X Club was grounded in heavily gendered discourses and structures of power receives almost no attention. Gender (insofar as it is discussed) seems to relate almost exclusively to women – scientific wives and daughters whose role in assisting the scientific work and fostering the social cohesion of the group is rightly highlighted. The gendered implications of the label 'men of science' is not explored; the term 'gentleman' is also treated as though it were a concept having solely to do with social status without any gendered connotations.

This is to miss a hugely significant factor in explaining not merely the power and influence which the X Club were able to exercise but also their limitations and weaknesses. An important strand of historiography highlighting the role of gendered self-fashioning in the construction of scientific authority (see e.g. Golinski 2008 & 2016 and Ellis 2017) is entirely missing from Barton's account. Also missing is any sustained engagement with history of science scholars who have sought to incorporate theoretical insights into the way power and authority operate within social structures and discourse. I am thinking particularly here of the work by Jan Golinski (2008) on constructivism and the history of science. As a consequence, Barton's discussion of power feels somewhat

over-simplified and flat, something to be possessed and exerted by groups and individuals without reference to the wider structures and discursive fields within which they are embedded.

What Ruth Barton has achieved with *The X Club* is no mean feat – in her own words – "a deeply personal account of scientific politics" characterised by references to "personal quirks or one another's scientific and philosophical theories" (9) This "deeply personal" microhistory unfortunately sits in tension with Barton's claim that this can also be a book for generalists. One of the things that makes the X Club truly representative of the wider social and cultural elite of late Victorian England is their leverage (not always successful) of social, gendered and racial power to pursue their aims. Only the first of these is explored in any detail in this book. Despite this, *The X Club* is a book which will make a significant contribution to the historiography of Victorian science, not least because of the depth and intricacy of the archival research on which it is based. It is a rich, detailed and insightful microhistory of the lives, relationships and wider networks of a very significant grouping of scientific men. As important work is done by Ruth Barton in placing the X Club members in the wider context of elite Victorian culture, the book will be of interest not only to historians of science, but also to historians of Victorian society and culture more broadly.

References

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