

BOOK REVIEWS

A Feeling for the Organism: The Life and Work of Barbara McClintock

Evelyn Fox Keller. New York: W.H. Freeman, 1983.

Fay Nemani

...basically, everything is one. There is no way in which you draw a line between things. What we (normally) do is to make these subdivisions, but they're not real. Our educational system is full of subdivisions that are artificial, that shouldn't be there. I think maybe poets – although I don't read poetry – have some understanding of this. (p. 204)

For a scientist – cytogeneticist, naturalist, biologist – raised in Western culture, this is an extraordinary statement. Patriarchal conceptual patterns are usually categorical (Barbara McClintock calls it subdivisional) and subjectively evaluative (hierarchical), and Barbara McClintock studied and worked within these patriarchal institutions of Western Science.

Barbara McClintock is one of those rare people whom patriarchal conceptual frameworks have not contaminated. This is basically why I agree with Evelyn Fox Keller in defining McClintock as a maverick and a genius. Many women (relatively speaking) gained access to the male-supremacist scientific world, but not many women withstood the isolation, the disparagement, the devaluation that Barbara McClintock did and still had the courage to challenge the prevalent male scientific dogmas.

Her gift for sifting painstakingly through details without losing sight and understanding of the whole organism; her ability to say "I don't know yet" as well as "Yes, now I know"; her critical attitude to prevalent suppositions and assumptions and her inability to lie to herself so she would see what she wanted to see; her ability to look at

concrete evidence and develop inferences which are coherent and compatible with the evidence and not vice versa; these characteristics are the markers of a genius mind and, at the same time, are due entirely to brain processes typical of women, which are more generalized and less specialized than those of males.

For a moment, let me assume that generalized brain processes are more suitable for scientific research than specialized ones. This assumption leads to the inference that women would make better scientific researchers than men. The question thus is whether Barbara McClintock is a genius because she is a woman or because of other factors. I cannot answer this question at present, simply because we do not have enough data on women in scientific research who were allowed to develop their own independent frame of reference outside patriarchally dominant thought.

Evelyn Fox Keller did not formulate the question I have posited above, yet her frame of reference, which is basically patriarchal, compelled her to answer it. According to the events which emerge from the book, Barbara McClintock is a genius in spite of being a woman. Her genetic theories were unaccepted not only because she was a woman but also because she was "difficult" (she couldn't tolerate fools or arrogant males) and because she was "ahead of her time." Evelyn Fox Keller may think that her explanations of the development of events is "objective" by including these two latter arguments, but by using these "myths" she also avoids true insights into the genius of Barbara McClintock.

Furthermore, Keller's description of the turning point at which Barbara McClintock's colleagues could "suddenly" no longer understand her new theory, which could have revolutionized the science of genetics in the 1950s, is at best feeble. People do not block their minds to new theories "suddenly," especially colleagues who supposedly held Barbara McClintock and

her work in high esteem. The only explanation of such an event is that the scientific community decided to ignore Barbara McClintock because they could not allow her the honour and recognition which should have led to a central position in the scientific community. As a woman, she could quite acceptably work in an isolated institution; after all, she had the respect of the greatest minds in the field, didn't she? Why would a woman dare to challenge these "great minds"? Evelyn Fox Keller's accolade to science as having "the capacity to overcome its own characteristic kinds of myopia reminding us that its limitations do not reinforce themselves indefinitely" (p. 197) is at best sarcastic. I do not buy this argument. As long as we live in a male-supremacist society, sexist myopia to women's genius will exist and will remain the cornerstone of science. Few women will be able to penetrate the higher echelons of scientific research, and these few will be the ones who conform to the patriarchal conceptual frameworks.

What made Barbara McClintock a genius? An extraordinary mind? Yes, perhaps, but not only that. Barbara McClintock was encouraged to develop and trust her own self, her own decisions, her own perception of reality.

"Very early she insisted, and persuaded her parents that she should have bloomers made of the same material as her own dress – 'so that I could do anything that I wanted . . . One time when I was out playing basketball or volleyball or something a woman on the block called me to her house, and I went up the steps leading to the front door. She invited me in, stating that it was time that I learned to do the things that girls should be doing. I stood there and looked at her. I didn't say anything but I turned around and went directly home, and told my mother what had happened. My mother went directly to the telephone and told that woman 'Don't ever do that again' " (p. 24).

Phyllis Greencare, a psychoanalyst

who studied the dynamics of artistic creativity, concluded that "the necessary condition for the flowering of great talent or genius is the development in the young child of what she calls a 'love affair with the world'" (p. 205).

Barbara McClintock's parents created for her the environment in which she was free to embrace the world with all her talents and energies, without instilling in her guilt or fear. They allowed her the freedom to be herself and encouraged her to trust herself. It may also have been pure luck that she did not learn to fear the world at an early age, as most women do.

It is this that is unusual in Barbara McClintock's upbringing. But can we say that all women who escaped early deprivation, as Barbara McClintock did, have potential for genius? I do not know; but I would like very much to explore this possibility, and I would also like to have the environment in which this hypothesis can be investigated – a non-sexist environment.

I do know that her early environment made her strong enough to withstand later adversity. Being labelled "just an old bag who'd been hanging around; incomprehensible; mystical and even mad" (pp. 141 and 143) did not deter her and did not bring about conformity to mainstream genetics.

The book celebrates Barbara McClintock's renewed recognition as her past research and accomplishments are replicated and validated and, above all, "suddenly" understood. Evelyn Fox Keller ends the book with a note of optimism from Barbara McClintock: "We're (scientists) going to have a completely new realization of the relationship of things to each other" (p. 207). I think that Barbara McClintock is by nature overly optimistic (although this does not come through in the book).

Before male scientists will be able to have a complete new realization of the relationship of things, they'll have to learn what a relationship is. I don't think they study that in science courses.

This book, as you can see, made me very angry. It is a well-written book, yet the author's "quest" for objectivity is frustrating. Objectivity, said Andrea Dworkin, means that it does not touch you; how could Evelyn Fox Keller not be touched by Barbara McClintock's life and genius?

Harem and Other Horrors: Sexual Bias in Behavioural Biology

Anne Innis Dagg. Waterloo, Ontario: Otter Press, 1983.

Fay Nemani

I enjoyed this small book tremendously. Anne Innis Dagg documents cases of sexual bias and misogynist statements in studies conducted by experimenters in the field of behavioural biology (the biological underpinnings of particular behaviours), specifically studies that deal with aggressive and sexual behaviours.

Anne Innis Dagg takes a step further – she actually names the "scientists" and details the methods by which their sexist bias has distorted and invalidated their research. The main tenet of the book is to document the cases in which "scientists" have *distorted and changed the data to fit their theories*. To prove that, Anne Innis Dagg presents experiments and findings, usually with a sounder methodology, that reach completely different conclusions. She also points out clearly that if original data is analysed with unbiassed mind, usually different conclusions could be asserted.

For example, an experiment which was done by McDowell *et al.* and appeared in the *Journal of Comparative and Physiological Psychology*, 53, (1960), concludes: "The results were interpreted as showing significantly greater inhibition of distractibility in both situations for the females than for the males" (p. 431). However, the experiment did not deal with distractibility; the title of the paper reads: *Sex as a factor in spatial delayed-response performance by rhesus monkeys*. The problem which faced McDowell *et al.* was to explain, in negative-emotive terms, the higher scores of female rhesus monkeys. Concretely and in a straightforward language, their statement actually means that female rhesus monkeys were less distracted (exhibiting greater concentration) during the experiments and performed significantly better on the tests than the males. Since the experiment did not quantify levels of distractibility or concentration, the conclusions are thus inferred. It is this process of inferring that is coloured by sexist bias.

By quoting from several unbiassed experiments, the author suggests that

females, depending on the species, are aggressive to various degrees, are sexually active, and on the whole do better on intelligence tests.

It is not surprising, then, that her papers have not been published in scientific journals. Anne Innis Dagg's conclusion is that "although various biologists who acted as referees feel that sexism and sloppy reporting in science should be highlighted so that they can be eliminated, the editors of a number of top scientific journals are not prepared to do this by publishing work that casts a shadow on mainline behavioural biology. Until they are willing to face these problems in biology, it is doubtful if sexual bias can ever be abolished" (p. 103).

The Cinderella Complex: Women's Hidden Fear of Independence

Colette Dowling. New York: Summit Books, 1981.

Deborah C. Poff

There is a shift in orientation in the women's movement. The shift is unfortunately a double-edged sword and we should consequently inspect the writings of its advocates with due care. The shift involves de-emphasizing the political aspects of the feminist movement and concentrating on the personal life of the individuals who have struggled and continue to struggle for freedom of equality. This new emphasis is epitomized by Colette Dowling's book, *The Cinderella Complex*. Dowling significantly notes that the focus of the feminist movement has been upon removing the external impediments to women's equal participation in all facets of human endeavour. According to Dowling, it is time now for women to focus upon their own previously neglected fears about success and independence. Unless women conquer their own socially conditioned and reinforced fears and myths, no amount of equal opportunity will result in an equal share of the goods.

This is true and important. However, this shift in focus cuts two ways. At least implicitly, it suggests that the political battles have been won and that now the responsibility for inequity lies with women themselves. Not only is this a dangerous misrepresentation of

the facts, but it fosters the perhaps more vicious blaming of the victim for not changing that which she is powerless to change.

Part of the reason for Dowling's approach is no doubt a consequence of the audience for which she is writing – the elite among women. She is talking to women who may be their own worst enemies, professionals who have education and income but systematically underachieve. She also addresses the professional who opts out of the job market and allows a man to support her, the woman who undermines her own ambitions only to find herself feeling a lack of self-worth and purpose in her life. Even with these women Dowling may be underestimating the visceral sexism, overt sexual harassment, and discrimination which is still a part of everyday life. More important, she overlooks those women (the majority) who are not struggling merely with their inner psyches.

This said, here are some positive aspects of the book. Dowling perceptively isolates many of the inner conflicts which certainly the majority of career women experience as a consequence of the incongruity between their conscious aspirations and their internalized value structure. She explores women's fears and their ways of dealing with those fears through an examination of her own recent struggle to grow into an autonomous and mature woman.

Much of what Dowling says, women already know. But, of course, that is often what makes a good book good. Dowling articulates our experience. Many women recognize their difficulty in balancing roles which they experience as incompatible. They also know that this is because as children they receive, at best, mixed messages about what they are supposed to do and be. Dowling's insight is that the consequence of myth and socialization in our culture is to provide women with a maladaptive and unrealistic desire "to be saved." This is usually not a conscious perception but an internalized view of what marriage will provide. Consequently, Dowling reports, many women function much better as single women than when married. Her prescription for us is to find the child, the dependent within ourselves, and help her to grow up.

As Dowling puts it: "I have learned

that freedom and independence can't be wrested from others – from the society at large, or from men – but can only be developed, painstakingly, from within." That is a large lesson to have learned and one which makes this book well worth reading.

Louise Michel

Edith Thomas. Translated by Penelope Williams. Black Rose Books, 1981.

L. Jane Abray

In her long life (1830-1905) Louise Michel played many roles: poet, schoolteacher, reformer, soldier and nurse, political prisoner, deportee, anarchist, playwright, novelist, feminist, lecturer. To her contemporaries she was "the Red Virgin," to her biographer, "the high priestess of anarchism." Perhaps her mother knew her best; Marianne Michel sorrowfully recognized that her daughter was "an artist in revolution." Revolution was Louise Michel's religion, and she devoted her life to the quest for a world of freedom, justice, and plenty.

Thanks to Michel's own writing, to the fascination of French journalists with her campaigns, and to the obsessive attentions of the French police, her story is well documented. Born the illegitimate daughter of a servant, quasi-adopted by her paternal grandparents, and raised in their chateau, Michel evolved from a devout and conservative schoolgirl into a schoolteacher who turned against the Catholic church, insulted Emperor Louis-Napoleon, and defended the rights of women.

By forty she was a radical whose life was becoming a drama. There is rich material for a biographer on her later life: Michel in the Paris Commune of 1871, now alone on sentry duty, now nursing the fallen, now shooting at her enemies; Michel a prisoner expecting to be executed for treason; Michel reveling in the long voyage to exile in New Caledonia (a French penal colony near Australia); Michel teaching Melanesians to blow up telegraph wires in revolt against their colonial masters; Michel returning in triumph to Paris; Michel in prison again, while her guards and the political masters of France join her in an extraordinary charade to spare her invalid mother worry about the true nature of her incarceration; Michel re-

leased, endlessly touring France to preach anarchism and women's rights; Michel shot in the head by an outraged listener; Michel dying at last at seventy-five, still dressed in full mourning for her fallen comrades of the Commune, still preaching a better world to come.

All these episodes are described in Edith Thomas's biography (originally published by Gallimard in 1971). Yet the biography is not dramatic. Thomas has sought the "true face" of Louise Michel and has allowed the excitement of Michel's life to be buried in a welter of mundane detail. The reader, numbed by lists of speaking engagements in such-and-such a town, on such-and-such a day, in this hall, at this hour, can barely rally to wonder why Michel was hooted in one town and cheered in its neighbour.

Part of the problem with this biography, and something which will be a particular difficulty for readers unfamiliar with nineteenth-century French history, is that Thomas does not set Michel in context. Translator Penelope Williams has tried to supply the missing context by brief notes identifying figures and incidents mentioned in the text, but these notes could be more extensive.

Another difficulty is that Thomas does not present a clear analysis of Michel's thinking. Consider Michel's position on "the woman question." We learn that Michel knew since her twenties that women writers were more likely to be taken seriously if they adopted a male pseudonym. We learn that throughout her life she worked with feminist groups and regularly discussed women's rights in her public lectures. Yet we never get a detailed consideration of Michel's definition of feminism and of how her thinking evolved. In her late twenties she was concerned with educational opportunities and equal pay. In her late fifties she argued that, in a better world, women would be free to stay at home and not have to work for pay. As an anarchist, alert to the possibilities for manipulating elections, she could not accept the vote as a panacea and kept herself out of the suffrage campaigns. Her attitudes may have been contradictory or they may have been consistent. Thomas, by reducing Michel's position to one of defence of (undefined) women's rights, gives us no way to know. The same kind of criticism could be brought

against Thomas's treatment of Michel's anarchism.

Thomas's book is the only full-length treatment of Michel's life in English. It has its problems. Some of the minor ones have been dealt with by the translator, but the extensive quotations from Michel's poetry are rarely even paraphrased in a note. Black Rose Press has apparently dispensed with proofreaders. Usually the typographical errors are merely distracting, but the disappearance of footnotes is more serious. The book cannot be read on its own. The reader will want a good history of modern France in one hand (say, Gordon Wright's) and a bilingual dictionary in the other. Michel deserves a shorter, snappier, and more analytical biography. Meanwhile Thomas's book is reliable for the facts of Michel's life.

Machisma: Women and Daring

Grace Lichtenstein. Doubleday, 1981.

Judith Posner

Machisma is a strange book. It is also an offensive one. It focuses on "macho women" or, as Lichtenstein says, women who make things "tough" for themselves: "She picks up the check at lunch with a male companion in an expensive restaurant and flashes a gold American Express card to pay for it . . . She dreams of becoming an astronaut and tells of her exploits as a tomboy

. . . She flies first class to Hawaii for a weekend on a whim . . . She subscribes to *Field and Stream*."

What makes her book offensive is her underlying assumption that women should learn to be "macha." In short, Lichtenstein accepts the notion of macho (or macha) as a positive value. This seems ironic at a time in which feminist literature has been vehemently criticizing the notion of macho and the ill effects of masculine societal values.

Furthermore, even if one agrees with her ethical bias, there is little in the book to substantiate her contention. Her characterizations are weak and make no attempt to delve into the psyche of so-called macho women, female mountain climbers, politicians like Bella Abzug, and movie stars like Jane Fonda. She mentions little about the conflict such women must feel (if they are indeed macha) about their identities. She never attempts to analyze in any depth how women come to choose a machisma lifestyle. The book is as offensive analytically as it is ideologically. For example, the first few pages of her book are devoted to a rather vague and circumlocuted discussion of the notion of machisma. Her generalizations are poorly documented and her illustrations reflect her uncritical theoretical assumptions.

"Machisma implies not just wanting to win or to be successful, but to beat someone or something, to show off, to strut one's stuff" (p. 10). Thus Lichtenstein's notion of machisma reflects a su-

perficial concern with form as opposed to substance. But perhaps she would argue that indeed this is what macho is about – the cool presentation of self. If this is the case it is hard to understand why anyone, especially a woman, would espouse such an attitude. In this light, it is interesting to note that Lichtenstein barely mentions the Latin American origins of the concept machismo and its usage historically. Only later in the book, in the context of a discussion of sexuality, does she even acknowledge the potentially destructive aspect of machismo: "Machismo in its most virulent form is terribly destructive, its ideology the excuse for rape, beatings, and murder" (p. 280).

Secondly, although Lichtenstein claims that machisma is relevant to risks that are other than physical, she begins with the latter and devotes most of the book to them. This is just another way in which she accepts a superficial masculinized value system and extends it to women. She even discusses in laudatory fashion women's sexual prowess in the light of traditional machisma. This section on sexuality epitomizes her bizarre value system and what is most disturbing about the book, its facile view of successful unconventional women and the fact that it holds up as an ideal the very thing that feminists and other social critics have been decrying. In short, it is a giant step backward for womankind and humankind as well.

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