"Community, Identity, Stability": The Scientific Society and the Future of Religion in Aldous Huxley's Brave New World

Brad Congdon Dalhousie University

Michel went over to the bookshelf and took down *What Dare I Think?* and handed it to Bruno. "It was written by Julian Huxley, Aldous's older brother, and published in 1931, a year before *Brave New World*. All of the ideas his brother used in the novel—genetic manipulation and improving the species, including the human species—are suggested here. All of them are presented as unequivocally desirable goals that society should strive for." *Michel Houellebecq*

I TAKE AS MY EPIGRAPH, and as the starting point of this paper, a passage from Michel Houellebecq's 1998 novel *The Elementary Particles*. When Bruno visits his brother Michel, he excitedly contends that "everyone says *Brave New World* is supposed to be a totalitarian nightmare, a vicious indictment of society, but that's just hypocritical bullshit. *Brave New World* is our idea of heaven: genetic manipulation, sexual liberation, the war against aging, the leisure society" (132). Michel, a molecular biologist, agrees, arguing that both Huxleys¹ believed totally in the kind of society depicted in *Brave New World* (1932) and that it was only after the Nazi

1 For ease of reading, Aldous and Julian Huxley will mostly be referred to by their first names.

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BRAD CONGDON is a doctoral candidate in the Department of English at Dalhousie University. His SSHRC-funded dissertation examines the competing constructions of masculinity in American literature, and it does so by examining various works as they were originally published in men's interest magazines. experiment "poisoned the well" of the eugenics argument, and after Julian became the director-general of UNESCO, that Aldous rewrote his own literary past, claiming that his novel had been a dystopia all along.

It is not difficult to counter Houellebecq's argument. A close reading of *Brave New World* reveals too many sites of satire simply to claim that Aldous was endorsing the specific scientific society he depicted. However, Houellebecq's argument correctly implies that reading the novel in the context of the scientific discourse that surrounded its publication problematizes the standard reading, which has led *Brave New World* to be recognized as "a kind of byword for a society in which the values (or nonvalues) of scientific technology are dominant, and which therefore reduced man to a species of machine" (Firchow, "Science and Conscience" 301).

Several scholars have complicated a simplistic dystopian reading of the novel by analyzing it alongside Aldous's positive view of eugenics and scientific planning, which he elaborated in nonfiction essays and letters around the time of *Brave New World*'s publication. Robert S. Baker, David Bradshaw, and Joanne Woiak,² for instance, have argued that analyzing *Brave New World* in the light of Aldous's interest in eugenics and scientific planning reveals a highly ambivalent novel, one which cannot be simply read "as a cautionary tale about the dehumanizing effects of technology" (Woiak 107–08). Instead, Aldous's novel can be seen as an imaginative engagement with the contemporary scientific debate surrounding the role of eugenics and scientific planning in the future of society.

Woiak's conclusion is that *Brave New World* "offers a sophisticated critique of how scientific knowledge emerges from and in turn serves the social, political, and economic agendas of those in power" (Woiak 124). Woiak concludes that the target of the novel's satire is not advanced science but the ideologies of societies which may use it; however, a more specific conclusion can be developed by reading *Brave New World* alongside *What Dare I Think?* by Julian Huxley. Following Woiak's suggestion to study "the influence of relevant scientific ideas and sources" (110) in the creation of Aldous's novel, my reading complements these studies by examining the ways in which the novel can be seen as a text that reflects Aldous's positive views of eugenics. More importantly, it also goes beyond these studies, by identifying the distinct areas of overlap shared with *What Dare I Think?*; in particular, *Brave New World* seems to be responding to Julian's call for a "world controlled by man" (42), his belief that such a world will require

² Baker, "Introduction" and "Aldous"; Bradshaw, "Huxley's Slump"; Woiak, "Designing a *Brave New World*."

preservations for "strange human beings" (24), and the potential for the use of advanced pharmacological substances (66–69). Of greatest interest is the way in which *Brave New World* responds to Julian's belief in a biological "religious emotion" (195). When the novel is read with Julian's thought in mind, it becomes clear that the religion of Aldous's planned society—Fordism—is the specific site of critique in *Brave New World*. Read alongside *What Dare I Think?*, Aldous's novel becomes not a cautionary tale of technology, or even eugenics, but a preemptive critique of the type of belief systems which might be mobilized to make the society of the future possible.

I. The Huxleys, Eugenics, and Speculative Fiction

Brave New World was published during a time of heightened rhetoric surrounding eugenics and population control.³ A relatively new field, eugenics was at its height of popularity in the years before World War II and was the subject of a great deal of scientific and popular discussion. Perceived at the time as a science, eugenics is interested in the genetic improvement of the human species through such practices as selective breeding, birth control, and sterilization. The eugenics movement called for greater control of the state over its people; by improving its "human stock," each state could expect, eugenicists argued, to be strengthened. Marius Turda explains that "eugenics and the state were mutually maintaining agents in that eugenic reforms required both a proper program of social engineering and the means of implementing them" (68). Eugenics was then linked to the notion of the scientific planning of society, and scientific planning was thought to have the same relationship to the state as eugenics did to the individual.

It was in literature that eugenicists engaged in the types of thought experiments that could be used to promote or challenge contemporary notions of planning and eugenics. One of the most important writings in the field came from J.B.S. Haldane, a Marxist and polymath and a friend of the Huxleys. In his 1924 book *Daedalus: or, Science and the Future*,⁴

- 3 For an excellent discussion of the eugenics debate, see Daniel J. Kevles. For an overview of the movement in Britain, including Julian's role, see Richard Overy (93–135). For a recent discussion of the connection between eugenics and modernism, see Turda.
- 4 The influence of *Daedalus* on *Brave New World* is well established in the scholarship. For example, Stableford notes that Huxley's novel is "considerably enriched by input from an alternative prospective for the future offered by J.B.S. Haldane in *Daedalus*" (267). Similarly, June Deery states that Aldous "no doubt got many of his ideas for *Brave New World* from J.B.S. Haldane's *Daedalus*" ("Technol-

Haldane speculates on a future increasingly shaped by the rapidly growing influences of science. Most relevant to the field of eugenics is Haldane's popularization of the term "ectogenesis," a hypothetical process whereby embryos would gestate outside of the womb, inside of incubators. While this process might be thought to change the discussion from one of eugenics to one of cloning, Haldane still posits this advance in eugenicist terms, seeing the advantages of selective reproduction as essential to the health of civilization:

The small proportion of men and women who are selected as ancestors for the next generation are so undoubtedly superior to the average that the advance in each generation in any single respect, from the increased output of first-class music to the decreased convictions for theft, is very startling. Had it not been for ectogenesis there can be little doubt that civilisation would have collapsed within a measurable time owing to the greater fertility of the less desirable members of the population in almost all countries. (66-67)

This bit of science fiction foresaw a time when eugenics would move beyond sterilization and other practical, contemporary practices and tried to imagine a future when humanity exercised total control over its genetics and the world. Haldane's book, and in particular this concept of ecotogenesis, greatly influenced the discourse surrounding eugenics for years to come.

The impact of *Daedalus* can be seen in the speculative fiction which relied on Haldane's book. For example, Bertrand Russell wrote *Icarus* as a response to the "benevolent view of science" presented in *Daedalus* (Dronamraju 3), and in 1931 he developed that work into *The Scientific Outlook*. Like *Daedalus, The Scientific Outlook* has been identified by several scholars as a source for *Brave New World*.⁵ Joseph Needham was

ogy" 115, n 4). Woiak sees it as the main source of inspiration for *Brave New World* (111). The best discussion of the relation between the two works is found in Firchow, "Science and Conscience."

⁵ Russell's doubts about the stability of a scientific society were based on the standard eugenic fears of degeneration: "Another reason for doubting the stability of a scientific civilization is to be derived from the fall of the birth-rate. The most intelligent classes in the most scientific nations are dying out ... Unless very radical measures are adopted, the white population of the globe will soon begin to diminish" (Russell 238). According to Russell, stability would require two prerequisites, both of which are relevant to Aldous's *Brave New World*: the adoption of artificial methods for stimulating breeding and "world-wide organization" (239). Russell's concern with stability finds prominence in the motto of Aldous's World State: "Community, Identity, Stability."

among the first to draw the comparison, stating in a 1932 review that "It is as if a number of passages from Mr. Bertrand Russell's recent book *The Scientific Outlook* had burst into flower, and had rearranged themselves in patches of shining colour like man-eating orchids in a tropical forest" (76). More recently, Philip Thody has gone so far as to state that so much of *Brave New World* resembles *The Scientific Outlook* that "one wonders at times if [Aldous] Huxley put any original ideas into his book" (50–51).⁶ Other contemporaneous utopian writings identified as possible sources for *Brave New World*, and influenced by *Daedalus*, have been discussed in lesser detail, such as J. D. Bernal's *The World*, *The Flesh, and The Devil* (1929) and the Earl of Birkenhead's *The World in 2030 AD* (1930).⁷

Taken together, these scholars have shown how *Brave New World* should be understood as one of many speculative eugenicist fictions written at the time. *Brave New World* differs importantly from each of these, largely due to its satirical approach. In addition, Haldane, Russell, Bernal, and Birkenhead seem to ignore both capitalism and religion, or at least their potential centrality to the society of the future; for these men, science will become the dominant system over all others, while in Aldous's future, science will remain a tool of both.

Julian and Aldous were grandsons of T. H. Huxley, known as "Darwin's Bulldog," who "exulted in using naturalistic weapons, the new biology, to demolish religious obscurantism" (Crook 63). From their grandfather they inherited a lifelong interest in science and religion, although their interest in religion was always a complicated one. For both Huxleys, the fascination with science led them to an intense interest in both eugenics and planning. During the 1920s and 1930s, Julian was a core member of the Political and Economic Planning committee (PEP) and a member of the Next Five Year Group (NFYG) (Allen 221). As a member of the Eugenics Society, Julian described himself as a "positive eugenicist." He explained

6 Peter Firchow counters Thody's argument, explaining that Aldous's thoughts were more likely an influence on Russell ("Science and Conscience" 304–09). Baker also offers an enlightening discussion of the relationship between Russell's *The Scientific Outlook* and Huxley's novel (*Brave New World* 63–76).

7 Woiak, for example, focuses on Bernal's book, in which the author speculates on a future where the human form, having been manipulated through eugenic and technological advances, has evolved into nothing but a brain in a "cylinder" attached to mechanical apparatus (Bernal 38–41). Woiak finds in Bernal's future a society "split into castes disturbingly comparable to Alphas and Epsilons" (122). For Jon Turney, *Brave New World* is best understood when compared with the Birkenhead, who views a future governed by scientific advances in purely optimistic terms (111–13).

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that, "negative eugenics is concerned with preventing degeneration,⁸ while positive eugenics aims at the improvement of the human stock" (*What Dare I Think*? 93).⁹ Despite his stated position, Julian actively campaigned for sterilization from the 1930s through the 1960s (Allen 213) and proposed, at the beginning of the Great Depression, that in the case of a married man on unemployment relief, "continuance of relief could quite easily be made conditional upon his having no more children. Infringement of this order could probably be met by a short period of segregation, say in a labour camp" (*What Dare I Think*? 87–88).¹⁰ Julian usually reserved talk of sterilization for the subject of "mental defectives," rather than discussing it in relation to the lower classes as many mainstream eugenicists did, but some of his suggestions bordered on the totalitarian.¹¹

Aldous Huxley's associations with both eugenics and planning were not as official as his brother's, but nonetheless he showed, at certain points around the publication of *Brave New World*, strong support for both causes. Bradshaw has elaborated on Aldous's associations with the PEP ("Huxley's Slump"), and Baker has noted how many of his essays from the 1920s and 1930s support the notion of scientific planning ("Aldous").¹² Perhaps most

- 8 "Degeneration" was the idea that the "human stock" was getting worse. The fear of degeneration was standard in eugenic discourse; in W.E. Castle's 1922 textbook *Genetics and Eugenics*, the author states that the only potential problem of population change is "that the biologically poorest elements in the population may increase faster than any other. The declining birth rate is not in itself serious, but the differential character of its decline is serious" (Castle 295).
- 9 This coincides with Kevles's distinction between "mainline" and "reform" eugenicists. While mainline eugenicists argued for sterilization, reform eugenicists "generally believed with [Julian] Huxley that 'the whole progress and stability of the collective human enterprise' depended upon the gifted capable minority who might prevail against the socially heavy 'dead-weight of the dull, silly, underdeveloped, weak and aimless'" (192).
- 10 For extensive discussions of Julian Huxley's connections to the eugenics movement, see Garland E. Allen and Elazar Barkan.
- 11 Around the time of the publication of *The Science of Life* (1931), which Julian co-authored with H. G. and G. P. Wells, Julian often repeated the call for sterilization. In the October 1930 edition of *Nature*, Julian wrote a letter arguing for the efficacy and desirability of the sterilization of "mental defectives" ("Eugenic Sterilisation"), which he echoed in an article for *The Birth Control Review* that December ("Towards").
- 12 For instance, in "Abroad in England" Aldous proposes "intelligent national planning, based somewhat ambiguously on the Soviet model" (Baker, "Aldous" 297) while in "Sight-seeing in Alien Englands" he advocates wide-scale planning and declares that "a well-organized factory is a work of art" (277). In "Science and Civilization," after analyzing Britain's ailments during the Great Slump, Aldous declares that "The remedy is a lot of science, well applied" (149).

provocative is Aldous's essay "What is Happening to Our Population?," published two years *after* the publication of *Brave New World*, wherein Aldous calls for the eugenic sterilization of the "feeble-minded" and "mentally deficient." The essay moots many of the same arguments made by Julian years earlier in "The Vital Importance of Eugenics."¹³ Although the brothers often disagreed on key issues, during the years immediately preceding and succeeding the publication of *Brave New World* the importance of eugenics was not a matter of contention.

Since the mid 1990s, scholars have struggled to align Aldous's interest in planning and eugenics, professed in his nonfiction essays, with the satirical edge of *Brave New World*. Reviewing Bradshaw's *Aldous Huxley Between the Wars: Essays and Letters* and Sexton's *Aldous Huxley's Hearts Essays*, where many of these essays were republished, Baker admits that Aldous's "Wellsian interest in massive social planning will necessitate some adjustment of our comprehension of the politics of *Brave New World*" ("Aldous" 295). Adding Julian's *What Dare I Think?* to the immediate context of *Brave New World* both facilitates and complicates this project.

Notwithstanding the amount of scholarship dedicated to finding Aldous's literary influences, to date insufficient scholarly attention has been paid to *What Dare I Think?* as an influence on *Brave New World.*¹⁴ The dearth of scholarly attention paid to the connections between the two is all the more puzzling when the brothers' mutual concern with the interaction of science and religion is considered. Julian was famously antagonistic toward organized religion and published *Religion Without Revelation* in 1927, in which he foresaw the replacement of organized

- 13 Both essays voice concern over the perceived rise in so-called "mental deficiency" or "mental defectives," both blame this on improved healthcare and sanitation, and both agree that they must "ensure that mental defectives shall not have children" (J. Huxley, "Vital Importance" 325).
- 14 Many of the existing comparisons are quite brief. For example, Thierry Bardini discusses the two works but only as part of a discussion of Houellebecq; in a footnote, he declares that "Julian Huxley's 1933 *What Dare I Think* is as much an inspiration for Houellebecq as *Brave New World* is" (186 n34). (Bardini omits the question mark in the book's title, and misidentifies the publication date.) Similarly, Maria Aline Salgueiro Seabra Ferreira mentions in passing a similarity between the two texts, arguing that in *What Dare I Think*? "many of the radical concepts dramatized in *Brave New World* were already mooted, such as genetic manipulation and improvement of the human species, a goal that is considered eminently desirable" (Ferreira 5). Ferreira's inspiration seems also to be Houellebecq; she refers to *The Elementary Particles* in a footnote following this comment (5 n20). Paul T. Phillips momentarily mentions *Brave New World* in a discussion of Julian's belief in eugenics (625), and Porter Sargent briefly reviews both books but makes no direct comparisons between the two (129).

religion by a series of secular humanist beliefs which he called, at different times, scientific or evolutionary humanism. Meanwhile, as June Deery argues, Aldous's "one enduring interest was in making science and religion conformable to each other" (*Mysticism* 3). Aldous and Julian also corresponded regularly; as Firchow notes, "there is no one to whom Aldous writes more letters than to his brother Julian" ("Aldous and Julian" 210). Considering the brothers' mutual interests in science and religion, and their ongoing dialogue, an in-depth comparison between Aldous's novel and Julian's near-contemporaneous *What Dare I Think?* is overdue and can shed light not only on both works but also on the debates surrounding eugenics, science, and religion at a time when their imbricated discourses were seen to be shifting.

II. Daring to Think of a Eugenic New World

Like many scientists and writers of the age, Julian and Aldous were greatly influenced by Haldane's *Daedalus*. In 1931 Julian published *What Dare I Think?*, a collection of lectures and essays regarding, as its subtitle states, *The Challenge of Modern Science to Human Action and Belief*. In it, he asserts what he calls "scientific humanism," announcing that "we must do our best to extend the use of scientific method into any and every field where it can be of use" (135). Julian complains that our "understanding and controlling human machinery" has been limited by being "confined to the period after birth, when the plasticity of the organism has been largely lost, and only minor changes can be induced" (48–49). The only possible solution to this problem is Haldane's notion of ectogenesis:

If ectogenesis were even possible, we could play all the tricks we liked on the early development of man ... For instance, the limit to human brain-power probably lies in the size of the female pelvis, which cannot give birth to babies with heads above a certain size. Abolish this cramping restriction, and you could embark upon an attempt to enlarge the human brain. (54-55)

For Julian, ectogenesis was a desirable goal for scientific humanism, since it was only through the intervention of science that the human organism could be improved upon.

The connection with *Brave New World* and *What Dare I Think?* is, here, quite direct: both look to Haldane's ectogenesis as a cornerstone for a new society. Aldous had considered this issue before; in his 1927 essay "A Note on Eugenics," Aldous fears that Haldane's ecotgenesis would

allow eugenicists to raise a society of superior individuals and he voices the fear that such a society "would live in a state … of chronic civil war" (283–84). This fear works its way into *Brave New World*, with Mustapha Mond essentially ventriloquizing Aldous's point of view when he discusses the Cyprus experiment, the creation of an island society inhabited solely by Alphas which quickly deteriorated into civil war (196).¹⁵ It should be noted, though, that Aldous is not speaking out against eugenics itself; rather, he is concerned that eugenicists are "in too much of an enthusiastic hurry to improve the race" ("A Note on Eugenics" 285). The implication is that eugenics could be used correctly.

In the same essay, Aldous concludes that "if the degeneration is allowed to continue unchecked ... the white races will be at the mercy of the coloured races, and the superior whites will be at the mercy of their white inferiors" (282). These racist fears echo the treatment of race in Brave New World. The novel's treatment of race is most clearly connected to The Scientific Outlook, where Russell states that if a scientific society is segregated into different social classes, then "there will be certain kinds of labour mainly performed by negroes, and that manual workers in general will be bred for patience and muscles rather than brains" (252). This possibility is based on an assumption that Russell does not challenge, the assumption that "negroes" belong to a lesser "race" than white people. Brave New World does not challenge this belief, either. For example, Aldous's description of an "Epsilon-Minus Semi-Moron" elevator operator in chapter four is rife with the language of racism. Because he is "genetically inferior," he is described in animalistic terms; he is a "small simian creature" who smiles "doggily" at his genetically superior passengers (50). Most of the lower classes are described as black.¹⁶ Even if Aldous is read as lampooning eugenics, he still reinforces the racist ideology that skin colour is connected to a supposedly natural genetic hierarchy.

Furthermore, the "Savage Reservation" reinforces this genetic hierarchy, clearly associating the white characters of the World State with civilization and genetic superiority. This racist setup is only strengthened when considered alongside Julian's contention in *What Dare I Think?* that a planned society should include reservations for "strange human beings like pigmies" (24). He mentions such a reservation during an extended discus-

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¹⁵ Others have made the same connection. See, for example: Woiak 114–15, Meckier "Neglected" 3–4, and "Prepping" 239–40.

¹⁶ See, for example, the Epsilon-Plus porter at the Savage Reservation (87), or the "black brachycephalic Deltas" and the "heat-conditioned Epsilon Senegalese" to whom John Savage is introduced (138).

sion of the treatment of nature. These nature reserves would preserve "rare and beautiful plants," birds, and other wild life, so that "their possibilities of providing recreation and beauty [would be] made plentifully available" (23–24). So-called "primitive" peoples would be held in the same regard as plants and animals, valued for their aesthetic qualities in the eyes of white, European society.¹⁷ Indeed, it is not the eugenic program that is challenged by the novel's protagonists or by the marginal members of the World State like Bernard Marx or John the Savage; rather, it is the culture of this society which is held up to scrutiny.

What Dare I Think? contains several similar instances of overlap with *Brave New World*. The role of the World Controller seems a direct response to Julian's call for "conscious planning" when building a scientific society (21) and his belief in a "world controlled by man" (42). Also worth mentioning is Julian's speculation on the future of drugs, imagining a time when "hitherto undreamt-of possibilities open out—of control over the very essence of our selves, over both physical and mental aspects of our organism" (66). Julian imagines,

pharmacological substances ... which would be capable of toning up a man's faculties by say ten per cent., and yet having no bad after-effect ... [medicine] could invent something which would make the average well man feel better, and persuade the population to adopt it, so that not thousands but millions would simultaneously be taking their "little daily dose." (68–69)

Clearly, this description is not so far removed from the drug of choice in *Brave New World*, soma, the "perfect drug" with "all the advantages of Christianity and alcohol; none of their defects" (46). While soma does not "tone up" a man's faculties, it certainly "make(s) the average man feel better" with each daily dose.

Obviously, there are many points of correspondence between *Brave New World* and *What Dare I Think?*, with the above being only a brief overview of a few shared interests. Each book should be understood as just one of many works of science fiction published during the early part of the century—such as those written by Russell, Bernal, and Birkenhead which attempted to imagine a scientifically planned society which took full advantage of contemporary eugenic thought. Rather than dismissing such

¹⁷ Other possible sources of inspiration for the Savage Reservation include D. H. Lawrence's letters, edited by Aldous (see Miller), and Havelock Ellis's *The Nineteenth Century: A Dialogue in Utopia* (see Mulvihill).

a future, Aldous in particular sought to imaginatively test its limits and probe the current line of thought for problems—one major problem being the fact that none of his contemporaries imagined a planned society in which capitalism would remain the driving force. Aldous seeks to highlight this discrepancy by focusing on the role of Fordism in his imagined society. To do so, Aldous focuses on his brother's concept of a religious emotion, showing how a biological function could be harnessed by the wrong kind of belief system, a capitalist system which leads to a dystopic future.

III. Eugenics as Religious Dogma and Religion as Biological Function

The dangerous combination of science, religion, and mass-production was the focus of Julian's only work of fiction, "The Tissue-Culture King," a short story that, much as What Dare I Think?, in many ways prefigures Brave New World. In it, a scientist named Hascombe uses his knowledge of Western science to pass himself off as a priest in a "primitive" African nation. In Julian's racist story, it is not ectogenesis that Hascome uses to manipulate the population but a eugenics program involved in breeding giants, dwarves, and obese virgins, based on the tissue-culture techniques popularized by the eugenicist surgeon and biologist Alexis Carrel. Hascombe's success comes from the application of assembly-line methods to the scientific process: "I have merely applied the mass-production methods of Mr. Ford," the scientist explains (456).¹⁸ Julian ends the story by rather clumsily asserting its moral, that "It is the merest cant and twaddle to go on asserting, as most of our press and people continue to do, that increase of scientific knowledge and power must in itself be good" (459). For Julian, Ford, as the paradigmatic capitalist, is emblematic of the social forces which might twist science to the wrong ends.

These elements of Julian's "The Tissue-Culture King" reveal the depth of the dialogue going on within the work of the two brothers, a dialogue that reaches its peak in the relationship between *Brave New World* and *What Dare I Think?* Reading these two works together makes it clear that Aldous's critical gaze was not focused on eugenics in general but on the possible role of religion in a eugenicist society in particular. Julian sees religion as an intrinsic drive found in the human animal, and in a planned society it is a drive that has to be controlled; his brother, Aldous, agrees

¹⁸ Julian's "The Tissue-Culture King" is itself a source deserving of further scholarly analysis, especially as it relates to the ideas found in *Brave New World*. Originally published in the *Yale Review*, it was later reprinted in *Amazing Stories*; here I refer to the *Amazing Stories* edition.

and uses *Brave New World* to critique the kind of religion which might manipulate this drive.

Julian sees eugenics and religion as intimately related, writing that "eugenics will at once be seen to embody a religious ideal and a moral duty. Religion can continue to direct men's minds to aims which are not merely immediate; but in place of other-worldliness it will stress that what in current terms would be called the realization of the Kingdom of God on earth" (253).¹⁹ Julian gives over the last part of his book to this subject, explaining that religion, like all other aspects of human life, can be subject to organization and planning.²⁰ According to Julian, "the capacity for religion ... is a general property of the human mind in the conditions of existence upon this planet" (193). For those hoping for a scientifically planned future, the task is "to study religion not as a problem of theology or scholastic logic ... but as an organic function, capable, like other human functions, of modification, training, and improvement" (188). This religious function in human nature, as seen by Julian, is identified as a "religious emotion" (195).²¹ Julian, then, sees religion as something that can be better understood and guided through the use of eugenics. Religious emotion is not necessarily tied to God but is instead a biological function.

Certain theologies and beliefs appeal to this biological religious emotion but are not essential to it. Stripped of a personal God, the religious emotion is still made up of two parts: "a reaction of the human spirit to the

- 19 The connection between eugenics and religion did not begin with the Huxley brothers; in 1904, for instance, Francis Galton—the inventor of the term "eugenics" and cousin to Charles Darwin—argued that eugenics "must be introduced into the national conscience, like a new religion" (5). Galton highlights two issues that both Huxleys would later address: embracing eugenics while fearing that "overzeal leading to hasty action would do harm" (6) and struggling with the role of religion in a society whose features are shaped by eugenics.
- 20 For an overview of Julian's views on religion, see Clark, 194–97, and Phillips. Phillips's essay largely deals with how religion fits into Julian's developing notion of "evolutionary humanism" and the controversy his ideas generate among adherents to orthodox religions.
- 21 In "Thomas Henry Huxley and Religion," published in 1926 as part of his *Essays in Popular Science*, Julian argued that his grandfather, the famous agnostic and evolutionary theorist T. H. Huxley, would think in much the same way were he to live in the twentieth-century. Julian imagines his grandfather arguing that "The idea of God or Gods is one which is found in the religious beliefs of the majority of men. It is thus a natural phenomenon, to be investigated by science equally with the colour of men's skins or their power to perform mathematical equations" (134). Further, Julian imagines his grandfather "making a profound survey of religion as a natural phenomenon—a real Natural History or Biology of Religion" (137).

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facts of human destiny and the forces by which it is influenced" and "a reaction into which there enters a feeling of sacredness" (191). Julian further explains that this "reaction of the human spirit" is not a unified reaction; in societies that have produced sophisticated religious dogmas, it may be a certain, predetermined reaction, but by and large the human mind "does not concern itself overmuch with their intellectual or emotional reconciliation into a single system" (194). His second qualification is that by "sacred," he means that "the emotion itself must contain that compound of fear and fascination, mystery and active interest, which, according to precise blendings, issues as awe, reverence, superstitious fear, or a sense of holiness; but it must be enlarged in a way which anthropologists have made familiar, so as to be capable of both a positive and a negative sense" (195). So, religious emotion is something that will always be a part of mankind, and if a scientifically planned society is to be successful, then it will be necessary to harness the religious emotion for the "greater good."

Aldous voices similar opinions regarding religion in a 1927 essay entitled "The Substitutes for Religion," in which he speaks of religion as "the rationalization of feelings and intuitions which we have just assumed to be substantially unchangeable" (249). He describes the religious state of mind as "a sense of awe in the face of the mysteries and immensities of the world," which is "rationalized in the form of belief in supernatural beings" (250). With the decline of organized religion, Aldous writes that the "religious instincts of those who have no recognized religion ... find expression in a surprising variety of non-religious ways" (250) and goes on to discuss what he views as the surrogates of religion, such as politics, nationalism, and the arts. These substitutes in some way can appeal to man's religious emotion, without the need for an actual religion, complementing Julian's notion that the religious emotion is something that can be modified.

Despite the challenges science poses to religion, Julian believes that "the need for some specifically religious system to organize the driving-force of the specific religious emotion still remains" (*What Dare I Think?* 247). Essentially, the drive for religion is hardwired into human nature and so cannot be removed from society, even a scientific one. So, he suggests that this instinct be channeled for the social good, citing the practice of "organized communal gathering[s] with a recognized procedure" as the best way to do so (248).

Julian's view of religion's role in our future clearly informs Huxley's writing of *Brave New World*. Directly responding to his brother, Aldous writes, in an essay dated 19 December 1931:

What is needed is some easily comprehensible mythology of humanity that will strike the imagination as forcibly as the old mythology of personal gods used to do and as the modern mythology of nationalism still does.

A mythology—and with it an organization, by means of which and within whose framework the individual can satisfy his innate desire for self-sacrifice and corporate activity—satisfy it not at the expense of humanity, as he does when his corporate activity is nationalistic or fantastically religious, but for humanity's benefit and greater glory.

Such a mythology and such an organization do not as yet exist; the time is ripe for the Messiah of humanism to create them. ("In Whose Name?" 315)

When Aldous prophesies a "Messiah of humanism," the humanism he had in mind may very well have been Julian's "scientific humanism"; indeed, much of the latter part of *What Dare I Think?* involves Julian's proposals for how a scientifically planned, eugenic society could be designed to satisfy an individual's religious emotion so as to benefit humanity at large. Aldous does not dispute these proposals. In *Brave New World*, he portrays a society in which the wrong kinds of mythology and organization have been designed to channel individuals' religious emotions. Whereas Russell, Haldane, Birkenhead, and Bernal all seem to neglect capitalism in their prognostications about a eugenic state, Aldous presents his reader with a planned society wherein the mythology and organization are easily recognized as Fordism and consumerism.

This reading of the novel recognizes that the focus of Huxley's satire is less on the concept of genetic engineering and a scientific, controlled society but on the particular form of "mythology" and "organization" that might be adopted by this society. Fordism is obviously the mythology of *Brave New World*; the substitution of "Our Ford" for the standard "Our Lord" makes this explicit. Fordism involves an iconography; "all crosses had their tops cut off and became T's," as Mustapha Mond explains, a reference to Ford's famous Model T automobile (45). Fordism also involves festivals, such as Ford's day celebrations and Solidarity Services.²² Such a mythology, combined with ectogenesis, would lead to the marriage of the assembly line and reproductive technology. As Jerome Meckier has discussed, when Aldous revised the novel's typescript, he sought to fur-

²² Aldous's Fordism is an obvious exaggeration of Ford's real-world social engineering practices; for a focused discussion of Fordist practices and *Brave New World*'s satire on Fordist efficiency, see Cobley 53–60 and 282–312.

ther Americanize the society it depicted, so that "a novel that began as a satiric rendition of the future according to H. G. Wells grew increasingly anti-Fordian" ("Americanization" 427). A standard reading of *Brave New World* could lead one to believe that Aldous sees these issues as endemic to eugenics itself, but, as we have seen, Aldous was a friend of the movement. It stands to reason, then, that it is Fordism, and not ectogenesis, at which Aldous is taking aim.²³

Aldous's attacks on Fordism account for the existence, and ubiquity, of consumerism in the novel, despite the fact that a society structured as his is would have no need for money. Indeed, the novel seems to portray a world that should be devoid of capitalism—since there is total state control of production, goods, and services—but where consumerism remains as a sort of vestigial limb. Huxley's desire to pinpoint consumerism as a particular "root of all evil" means that he ignores the contradictions in the continued existence of the moneyed system in his World State.²⁴ This may account for Julian's "conscription of reproduction" (86) showing up in *Brave New World* as a "conscription of consumption" where "every man, woman and child [is] compelled to consume so much a year. In the interests of industry" (42). Capitalism exists not to satisfy the demands of the economy but, instead, the individual religious emotion.

In accordance with Julian's previous statements on religion, *Brave New World* features "organized communal gathering(s)" with "recognized procedure(s)" in the form of the Solidarity Services, where twelve individuals sit around a circular table and sing Solidarity Hymns, songs valorizing fellowship and total integration ("corporate activity"). The ritual climaxes with "the approaching atonement and final consummation of solidarity, the coming of the Twelve-in-One, the incarnation of the Greater Being. 'Orgy-porgy' it sang" (73). For someone fully imbricated into Fordism, the Solidarity Service is a perfect religious experience satisfying the religious emotion. The ritual clearly achieves this purpose for one of the participants, Fifi Bradlaugh, who looks at Bernard Marx with "an expression of

- 23 Aldous made this clear just months before the publication of the novel: "The humanist would see in eugenics an instrument for giving to an ever-widening circle of men and women those heritable qualities of mind and body which are, by his highest standards, the most desirable" ("Science and Civilization" 153). Aldous compares a humanist use of eugenics to an "economic" one, which would "train up a race not of perfect human beings, but of perfect mass-producers and mass-consumers" (150).
- 24 As Sexton has noted, while state capitalism seems to exist in the novel, Aldous "is rather silent as to the exact form the Fordian economy takes" ("Rationalization" 430).

rapture ... a rich and living peace" (74). It is not quite as successful for Bernard, however, and perhaps it is because the rituals of Fordism do not successfully engage his religious emotion that he feels such an outsider in the World State.

Following Julian's logic, it is no surprise that Bernard must seek another outlet for his religious emotion. According to Julian, forces of nature, such as the sea, are an example of "objects or circumstances which generate(s) religious emotion" (200). In the very next chapter, Bernard takes Lenina on a "date," at the end of which his helicopter hovers over the rushing Channel. There, Bernard explains his feelings to Lenina, describing his own religious emotion, one that moves him toward individuality instead of the group: "It makes me feel as though ... as though I were more me, if you see what I mean. More on my own, not so completely a part of something else. Not just a cell in a social body. Doesn't it make you feel like that, Lenina?" (78). It does not, in fact, make Lenina feel like that; just as it was for Fifi Bradlaugh, so too is Lenina's religious emotion usually fully engaged by the Solidarity Services. In the Savage Reservation, though, Lenina's religious emotion is engaged when she listens to the sound of the Indians' drums:

Shutting her eyes she abandoned herself to their soft repeated thunder, allowed it to invade her consciousness more and more completely, till at last there was nothing left in the world but the one deep pulse of sound. It reminded her reassuringly of the synthetic noises made at Solidarity Services and Ford's Day celebrations. "Orgy-porgy," she whispered to herself. These drums beat out just the same rhythms. (97)

Lenina reacts so positively to the drums because, in the same way as the many individuals of the Solidarity Service are reduced to one at the height of their "orgy-porgy," here the many sounds and stimuli of the Indian Reservation are reduced to "one deep pulse."

In any event, where there is no drumbeat, and no Solidarity Service, there is always soma, which is provocatively described as "Christianity without tears" (210). The drug is described in religious terms, since it assuages religious emotion, allowing its users to "periodically escape from the pressure of routine and worldly cares" (J. Huxley, *What Dare I Think?* 248). Clearly, the World Controllers of *Brave New World* were well aware that the religious emotion is "an organic function" and took great steps to modify, train, and improve upon it, all in the name of Our Ford.

Despite the manipulations of the World Controllers, even Epsilons occasionally feel their religious emotion engaged outside of the regular

Fordist rituals. For example, there is the previously discussed racist passage focusing on the elevator operator, whose reaction upon taking his passengers to the roof is so profound: "He flung open the gates. The warm glory of afternoon sunlight made him start and blink his eyes. 'Oh, roof!' he repeated in a voice of rapture. He was as though suddenly and joyfully awakened from a dark annihilating stupor. 'Roof!'" (50). For Firchow, this passage shows the limits of conditioning, revealing "how impossible it is, even under 'ideal' technological conditions and even with the stupidest humans, to block out all knowledge of a different and better reality" (End of Utopia 24). John Attarian agrees, adding that "it is a metaphor for attaining the Beatific Vision," a direct communication with God (335). Here, I would modify Attarian's argument to claim that this passage describes less the attainment of a Beatific Vision than the activation of the elevator operator's religious emotion, in much the same way that Bernard finds his religious emotion engaged when hovering over the Channel. These passages seem to insist that there is some hope, that even if the religious emotion can be manipulated and modified to fit one kind of society, it cannot be wholly contained and the possibility of refitting it to another, better system of beliefs still remains.

However, the only opposition to the religion of Fordism that Aldous supplies his readers comes in the unsatisfactory form of John the Savage. In the previously discussed essay "The Substitutes for Religion," Aldous speaks dismissively about the sort of asceticism practised by John, giving over only one paragraph to it: "Asceticism is common to all religions. It is unnecessary to try to explain why men should have believed that they could win the favours of the gods by abstaining from pleasure and comfort. The fact that they have done so is enough for us" (250). As well, he sees Puritanism as a kind of misplaced religious instinct, claiming that "ages of faith, if one may judge from medieval literature, were not ages of Puritanism" (254–55). Perhaps this is why the narrator of *Brave New World* quips about "the artificial impotence of asceticism" before John is introduced, suggesting that such a lifestyle is brought on by "mental excess" leading to "the voluntary blindness and deafness of deliberate solitude" (59). John, then, is also someone whose religious emotion has been incorrectly channeled and so cannot represent an attractive alternative to Fordism.²⁵ His

25 Discussing the novel as a satire on Freudianism, Meckier also claims that John cannot be an alternative to Fordism, convincingly arguing that John "proves that there is no such thing as a noble savage, unspoiled and unconditioned" since "he is quickly revealed as the archetypal Freudian case history: John moves

opposition to science and technology, so different from the belief of both Huxleys, should not be identified as an admirable character trait.

It is not a fear of scientific technique, of eugenics, or even of the World State, themselves rarely (if ever) the focus of Aldous's satire. Despite Houellebecq's claim in my epigraph, Julian does not see every scientific advance of his proposed future society as an "unequivocally desirable goal." Much depends on how such advances are used, and the moral use of science depends largely on the religious beliefs of a society. Although Julian is clearly optimistic about man's increased power over his evolution and his environment, in *What Dare I Think?* he does take the time to caution his readers: "I do not share the facile optimism which sees in every increase of power, every fulfillment of a wish, a necessary good" (7). In this section, Julian makes a similar claim to one he also articulates elsewhere, that science is "morally and emotionally neutral" ("Religion" 382). Likening science to a tool, Julian explains that its particular use depends on society's values:

For what religion can do is to set up a scale of values for conduct, and to provide emotional or spiritual driving force to help in getting them realized in practice. On the other hand, it is an undoubted fact that the scale of values set up by religion will be different according to its intellectual background: you can never wholly separate practice from theory, idea from action. Thus, to put the matter in a nutshell, while the practical task of science is to provide man with new knowledge and increased powers of control, the practical task of religion is to help man to live and to decide how he shall use that knowledge and then powers. ("Religion" 382)

Aldous's fear, like his brother's, is that a religion, informed by its own particular intellectual background, will lead men to use scientific knowledge and powers in morally corrupt, dehumanizing ways. It is not a fear of scientific technique, of eugenics, or even of the World State that are themselves rarely (if ever) the focus of Aldous's satire; rather, it is a fear of the wrong sort of society arising, one where the tenants of Fordism, informed by the intellectual background of mass production and consumption, take the place of religion.

That *Brave New World* was specifically targeted at identifying consumerism as a potential, and "bad," mythology—one which harnesses the religious emotion so as to direct corporate activity toward corrupt ends—and not at denouncing eugenics and technology, is highlighted

from an Oedipus complex, which warps him for life, to a death wish that finally terminates him" ("Our Ford" 43, 42).

by comparing the novel to Aldous's later utopia, *Island*. Here, it is worth once more considering Houellebecq's discussion of the Huxleys in The Elementary Particles. Houellebecq, seeking to further his claim that Aldous endorsed eugenics, discusses the similarities between the two novels: "If you look at it closely, the harmonious society in *Island* has a lot in common with Brave New World. Huxley was probably senile by that time. He didn't seem to notice the similarities himself. The society in Island is as close to Brave New World as hippie liberalism is to bourgeois liberalism—or rather to its Swedish social-democratic variant" (133). The similarities that Houellebecq passes off to senility can be better understood as a result of Aldous presenting a similar futuristic society which has found a better way to engage the biological religious emotion. After years of religious research and experimentation with drugs following the publication of Brave New World, Aldous seemingly discovered an alternative to Fordism capable of directing the corporate activity of a planned society; whereas Fordism is based on consumerism, the Palanese lifestyle is based on secular humanism and Eastern philosophies. It is the Palanese who have created an "easily comprehensible mythology of humanity" in which the individual can satisfy his or her innate desire for corporate activity "for humanity's benefit and greater glory" (A. Huxley, "In Whose Name?" 315). The difference between a dystopia and a utopia, Aldous would have us believe, is not a matter of technology but the object of faith.

Conclusion: What Dare We Think?

Clearly, Brave New World is engaged in a dialogue with other eugenic futurist texts published around the time of its writing. One of the results of reading it alongside these other texts is the revelation that the novel's ambivalences stem directly from the scientific thought of the time. These ambivalences include: the existence of consumerism in the novel, despite the conditions for capitalism being absent; the supposed antagonist Mustapha Mond presenting the most convincing voice in the novel; the supposed protagonist John the Savage representing an inadequate alternative to Fordism; and Aldous's explicit acceptance of racist beliefs. To return to Baker's previously stated concern that knowledge of Aldous's belief in scientific planning will require a review of the politics of *Brave New* World ("Aldous" 295), this reading reveals Aldous as a typically racist, classist eugenicist who believed, at the time of its writing, in the necessity of eugenics and massive social planning to stave off the threat of "degeneration." These beliefs inform the writing of his novel and are not challenged by it. However, a more specific result of reading the novel in relation to

What Dare I Think? identifies the importance in the novel of the biological religious emotion which intrigues both Aldous and Julian. *Brave New World* identifies in Fordism a possible, even a likely, mythology used to organize a planned scientific society. The implication that arises from such a reading is that Aldous believes a better, more constructive organizing mythology is possible, even desirable.

Such eugenicists as Haldane, Bernal, and Julian Huxley were all writing science fictions of their own, depicting for their readers the possibilities science would open up in the future. *Brave New World* may differ in its narrative structure, as novel rather than essay, but in every other way it is doing the same work as these texts. How it specifically differs from the speculations of these scientists is in its concern for the central role which capitalism might take in such a future. *Brave New World*, then, offers a critique of these other extrapolated futures, primarily through its focus on religion—specifically, Fordism. If John the Savage is an unsatisfactory hero, if Mustapha Mond's statements seem more convincing than John's opposing views, then perhaps it is because Aldous, like his brother, is engaged and aroused by the possibilities of eugenics, even as he is horrified by them.

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