The Racialization of Architectural Character in the Long Nineteenth Century

The appreciation of beauty on the part of primitive peoples, Mongolian, Indian, Arab, Egyptian, Greek and Goth, was unerring. Because of this their work is coming home to us to-day in another truer Renaissance, to open our eyes that we may cut away the dead wood and brush aside the accumulated rubbish of centuries of false education. This Renaissance means a return to simple conventions in harmony with nature. Primarily it is a simplifying process. Then, having learned the spiritual lesson that the East has power to teach the West, we may build upon this basis the more highly developed forms our more highly developed life will need.

—Frank Lloyd Wright,

Ausgeführte Bauten und Entwürfe

FRANK LLOYD WRIGHT HAS BECOME a representative figure of the Western paradigm of architectural organicism that proliferated in the United States during the long nineteenth century. This transatlantic philosophy of design was disseminated through the architectural writings and experimental buildings of European and North American innovators including Eugène Emmanuel Viollet-le-Duc in France; Gottfried Semper in Germany; and Henry Hobson Richardson, Frank Furness, and Wright's mentor, Louis Sullivan, in the United States. In 1911 Wright used a period of personal and professional reassessment to summarize his philosophy of style for European audiences in the German-language monograph Ausgeführte Bauten und Entwürfe (fig. I.1). In the introduction to this text, he uses narrative descriptions of nature to outline the metaphorical principles of design behind his architectural style for modern America: the Prairie Style. While his prose is rife with vivid references to living organisms—including the floral imagery that was a common trope of

Sullivan's architectural writings—he does not ground his architectural style in a direct imitation of the external features of plants or animals. For Wright, a mimetic approach was the "dead wood" of Renaissance theory that prevented Americans from formulating their own national building style. He believed an alternative approach was necessary for the renewal of contemporary artistic culture. In lieu of a mimetic model of nature, he chose to abstract the rules nature uses to create life in a system of design that was capable of "growing" the primary features of his architecture from the fundamental "conditions of life and work" in democratic America. While the architectural forms he created did not immediately look like any recognizable living organism, he believed they behaved as living organisms did by using a central idea or concept to functionally and aesthetically integrate the individual parts of the project into a consolidated whole. Wright's Prairie Style of architecture continues an important disciplinary tradition in the West of metaphorically relating the principles of nature to the arts in order to establish the autochthonous building styles that clarified and aesthetically embodied the life of the nation.

In a significant passage in the introduction to Ausgeführte Bauten und Entwürfe, Wright explicitly uses the concept of character to denote the ways that a building's material features embody the social, cultural, and political traits of the people it serves. In contrast to an iconographical representation of cultural identity, Wright uses character to denote the meanings an architectural environment accrues when its spatial, structural, and material features emerge seamlessly from the patterns of everyday life. As a result of the close relationship between the historical conditions of emergence and the material constitution of this form, the resulting architectural style is perceived to be uniquely expressive of the social conditions of its origin. Supplementing his study of nature on the family farm in Wisconsin with the retrospective gaze of the historian, Wright constructs a comparative list of the relative beauties of primitive building forms as proof that all of the vernacular styles of history are regulated by a common set of universal principles that continue to order architectural forms in the present. He even wonders at the feeling of Italianness he experiences when interacting with the premodern architectures of Florence and the Veneto, a site on his first tour of Europe, as encouragement for his own search for an autochthonous building style for America. The only change that he admits to this historical tradition is the increasing need to secularize the spiritual content of architectural forms to match the secular character of modern society.

By the end of his introduction Wright claims to have developed an authentically expressive architectural character for the modern world in his Prairie Style. Many of his critics have agreed. A long line of Wright interpreters praise the Prairie Style for challenging the interior customs of decorum that subtend the partitioned domestic interiors of Victorian architectures to better support

the customs and rituals that were introduced by life on the open prairie. Taking a cue from Wright's *Autobiography*, this scholarly tradition interprets the low-hanging eaves, the horizontal brick banding, and the concrete stylobate of this style as a literal deconstruction of the "closed boxes" that were a common feature of Victorian styles. It is probably more correct to say that Wright effectively synthesizes two seemingly oppositional elements of midwestern culture. As C. Robert Haywood reminds us in his book *Victorian West*, the infrastructural development of the frontier was based on a delicate balance between the cattle ranches that provided the economic substructure for local trade and the aesthetic trappings of middle-class Victorian culture that elevated these towns into new urban centers of commerce and social distinction. By the interwar and postwar periods the Prairie Style had proliferated beyond the geographical confines of the prairie, which transformed this regional building style into a national sign for modern domestic life.

This brief recounting of Wright's comparative history of primitive culture exemplifies an enduring myth of the transatlantic paradigm of architectural organicism. This myth originates with the belief that every society in the premodern world develops a distinct architectural character or style that embodies their unique way of life. This credo reaches back to Vitruvius's Ten Books of Architecture, but was updated in the nineteenth century by a complementary set of scientific models for historical study that rationalized disciplinary debates. In Western Europe, the political debates of newly emerging nation-states prompted a frenzied search for the historical origins of European cultures. Nearly every sector of society looked to modern ethnographic histories to trace contemporary national trends back to the remote past and thus distinguish the major powers of the Continent. Viollet-le-Duc and Semper famously employed ethnographical frameworks for their histories of architecture, with the latter going so far as to identify his approach as a practical branch of anthropology for the design professions. As architectural organicism migrated to the United States, modern architects built upon these European origin myths by engaging in the parallel study of world cultures that were brought together by the democratic experiment. Taking the scientific basis of comparative ethnographical histories of architecture as a given, these designers focused on the material cultures of peoples directly related to the semantic associations of architectural programs accruing within their immediate contexts in the New World. The most famous examples of this disciplinary tradition are Sullivan and Wright's celebrations of the material cultures that coexisted in the American Midwest, including the Byzantine references of the Chicago Style and the Japanese precedents of the Prairie Style. While architectural historians have recovered the diverse cultural references that these American innovators used to create an American architecture, not enough have explicitly considered the potential role that Western

civilizational frameworks, and especially white nativist discourses, must have exerted on these design movements.

If we stop to consider the hegemonic effects of whiteness on the architectural style debates, then it becomes reasonable to ask how the creation of an autochthonous national style of building reflects nativist interpretations of national character. When this question has been considered in relation to representative figures in the past such as Wright, many of the answers have applied an anachronistic multicultural framework to interpreting his architectural legacy. Much of this scholarship views his textual references to Japanese, Native American, and pre-Columbian cultures as evidence of Wright's progressive attitude toward the growing diversity of the American body politic. But even if we believe that his references to non-Western material cultures and his strident faith in American individualism were progressive for their time, we also know that his Prairie Style was built for an elite audience that could afford servants and, in many cases, were beneficiaries of the white hegemonic ideal of American citizenship operating at that time. This conservative vision of American character may have also influenced Wright's thinking and his architectural production. It makes sense for the architectural historian to at least consider the potential influence that hegemonic definitions of national character might have had on the modern architects' management of modern architectural styles.

The romantic mythologies of the American frontier that underwrote the most popular definitions of American character in the nineteenth century almost exclusively focused upon clarifying the shifting boundaries of whiteness that were being pluralized by the democratic experiment. As waves of European immigrants settled and intermarried in the United States, contentious debates emerged regarding the prevailing national character that resulted from this amalgamation of cultural stock. What were the essential characteristics of the American race, and which peoples best represented the potential of this stock? The political discourse of manifest destiny further racialized period debates on American character, but this time for both white and nonwhite populations. Politicians, preachers, businessmen, and frontier settlers of all stripes depicted the settlement of the New World as a righteous war between the civilized agents of Western civilization and the primitive savages of the East.

Only when we examine the cultural politics of national building styles for the ways they reflect the racial assumptions of this period can we begin to take note of the nativist tones of certain passages in Wright's writings. For example, if we return to his introduction to Ausgeführte Bauten und Entwürfe, Wright's admission to gleaning a "spiritual lesson that the East has power to teach the West" is paired with a mandate of aesthetic destruction that paves the way for an authentic future modern style: "His machine, the tool in which his opportunity lies, can only murder the traditional forms of other peoples and earlier times. He



Figure I.2. Léon Cogniet, l'expédition d'Egypte sous les ordres de Bonaparte, 1835.

must find new forms, new industrial ideals, or stultify both opportunity and forms." This destructive modality for cultural production is a prescient parallel to the political oppressions that nonwhite peoples suffered in the historical fulfillment of manifest destiny—from Native American tribes, African American slaves, and Mexican migrants to the Chinese laborers who laid the railroads that established the first intercontinental railroad in the United States. Wright's mandate for aesthetic destruction treads the same ground that the political strategies of European colonialism set in its settlement of colonies in America if not before. Napoleon Bonaparte's colonization of Africa is famous for its retinue of scientific advisors that established a clear pattern for politically exploiting the artistic knowledge of the other (fig. I.2). These political implications are also present in Semper's artistic interest in the native Māori tribes of New Zealand, a territory that German chancellors later sought to colonize during their brief foray into colonialism in Africa, Asia, and the South Seas.

Within the geographical context of the United States, and especially within the midwestern territories that were previously held by native peoples, modern architectural styles and theories of national character became mutually supportive paradigms for delineating the social boundaries of the nation-state. The romantic mythologies of the American frontier that provided a clear reference point for Wright's Prairie Style was in conversation with hegemonic interpretations of American character that privileged the social, political, and cultural perspectives of European colonial settlers and successive generations of Euro-American citizens. The mere recognition of this relationship better prepares us to identify the specific function of racial discourses in modern architectural debates more broadly. As the historian Anders Stephanson notes in his seminal study of manifest destiny in American studies, the ruminations on white racial character in debates on American citizenship directly enabled white frontiersmen to naturalize their occupations of the west.⁵ Sometimes these efforts were levied to wrest claims of land ownership from nonwhite native peoples, but at other times they were used to more clearly define which racial and ethnic groups from Europe were most worthy of determining the central elements of American democracy. Even when nonwhite peoples were recognized as contributing to the development of American life, they labored under the prejudice that they could never fully assimilate the Anglo-American values that dominated the political imagination. Recent publications in American studies demonstrate the inherent racial charge of period definitions for American character, especially in the efforts of competing racial groups to concretize and secure their rights as citizens of the United States.⁶ A similar effort needs to be undertaken in architectural history to understand how design factors in enabling and disabling certain populations to secure the American dream (or the dreams of other nation-states that purported to represent the values of Western civilization in the nineteenth century).

Our current examination of the racial politics that conditioned the transatlantic dissemination of architectural organicism begins by asking a few pointed questions of the political function of national architectural styles. What definitions of national character did modern architects use to establish their autochthonous styles of building in the past? And what racial, ethnic, and cultural characters were most privileged by these disciplinary debates? This book poses these questions to the range of architectural strategies that were used to produce national architectural styles within the paradigm of architectural organicism, from the pioneering concepts of French structural rationalism and German tectonic theory to the nationalist associations of the Chicago Style, the Prairie Style, and the International Style. Using the concept of character as an interpretive lens, this study identifies the racial content that has not yet been examined within the modern architectural style debates. This content includes the racial logic that is structurally endemic to scientifically rationalized discourses of architectural style, as well as the specifically racist associations that architectural styles accrued as a result of their discrete political contexts.

My explicit reference to Wright's architectural theory thus far has only been a convenient prompt to begin a critical conversation about the historical integrations of race and style theory that have proliferated within all branches of architectural organicism. The social and political contexts of the nineteenth century effectively foreclosed progressive conceptions of an integrated citizenry that provided equal social status and legal protections for the white and non-white peoples cohabiting within Continental and North American territories. This polemic primes us to develop a more principled interpretation of the racial assumptions perpetuated by the organic architectural traditions that were inaugurated to help formulate the mythological boundaries of our national pasts.

Race, the Human Body, and Architectural Organicism

The cultural associations of national building styles found in nineteenth-century architectural treatises are indicative of a deeper critical tendency within architectural organicism that treats race and style as two parallel empirical expressions of natural law. This scientific mode of analyzing the past mythologizes the power of vernacular buildings to operate as transparent signs of cultural identity and emblematic containers for the constituent elements of one's social habitus. The modern architect's belief that certain design solutions more authentically reflect the state of local culture than others is an important supposition to critique, since every design of a time period is, by definition, conditioned in one way or another by the social, political, or economic contexts of its making. So, what is it precisely that grounds the perception that certain building forms have more rigorously mirrored the prevailing customs of a particular social and cultural context? What conceptual principles provided an architect with the aesthetic sensibility required to first interpret and then regulate the aesthetic appearances of national architectural styles?

By the turn of the century a number of humanist scholars experimented with employing the comparative methodologies of the social sciences to deduce the invisible laws of order that regulated the evolution of architectural styles over time. Of the many works included in this tradition, we could cite Johann Gottfried Herder's *Ideen zur Philosophie der Geschichte der Menschheit* (1784); James Cowles Prichard's *The Natural History of Man* (1844); Owen Jones's *The Grammar of Ornament* (1856); Hippolyte Taine's *Philosophie de l'art* (1865); and Sir Banister Fletcher's *A History of Architecture* (1896), to name just a few. These texts collectively propagate the idea that premodern vernacular building styles automatically emerged when a local people learned to apply raw materials toward a functional problem in a straightforward or pragmatic way.

This interpretation echoes the ecological principles of racial variation put forward in the natural sciences, which alternately credited a number of seen and unseen biological mechanisms for the apparent variation of human culture around the world. Subsequent investigations in the burgeoning field of racial anthropology examined the cultural implications of biological laws of development on human settlement patterns and artistic customs. The most influential standards used typological theories to substantiate the taxonomic categories of human differences that were invented by botanists and zoologists in the eighteenth century. Modern architectural critics extended this scientific view of nature into architectural discourses in order to revitalize the spiritual and aesthetic instincts they believed were especially powerful at the beginnings of human culture but had become muted by the rationalist biases of the Enlightenment. Jean-Jacques Rousseau's positive estimations of the primitive world, emblematically represented by his rhetorical figure of the noble savage, is only the most recognizable variation of this line of thinking. The primitive instinct for artistic form was seen as a social palliative for the cultural plights of modern man, who was in great need of a common social principle to bind him to his fellow man within the emerging nation-state.

Within the field of race science, biologists, anthropologists, and sociologists used the term race to describe a wide range of phenomena in nature, from the breeding properties of language groups and the physical appearance of organic specimens to the cultural products generated by a common group of people. The analytical value of the race concept strategically shifted in the late eighteenth century from taxonomic to typological criteria as scientists revised the meaning of species criteria in the natural and life sciences. Georges Buffon introduced internal physiological criteria for categorizing race types; namely, the sexual selection of animal species, which complicated the physical or taxonomic criteria that Linnaeus had decided upon nearly half a century earlier. Races were now defined by the organic principles of growth regulating physical appearances instead of just a similarity of appearances. This embodied criterion extended the critical importance of the race concept even to ephemeral phenomena such as language. The German linguists Friedrich Max Müller and Franz Bopp famously used the term race to categorize the different language groups that evolved from the first spoken language of European man, what they called the Indo-European language. At this time Müller and Bopp were adamant that the racial typologies for acquired skills such as language did not always cleanly correlate with the physical categories that biologists used to distinguish human differences. Yet languages appeared to exhibit the same organic principles of development as biological race types as phylogeny, or the grammatical structure of mother tongues and sister languages, by passing on a fixed set of recognizable traits from one generation to the next that could be traced back to a common origin (fig. I.3). These relationships were visually communicated through extensive tree diagrams that would find discrete parallels in architectural history.

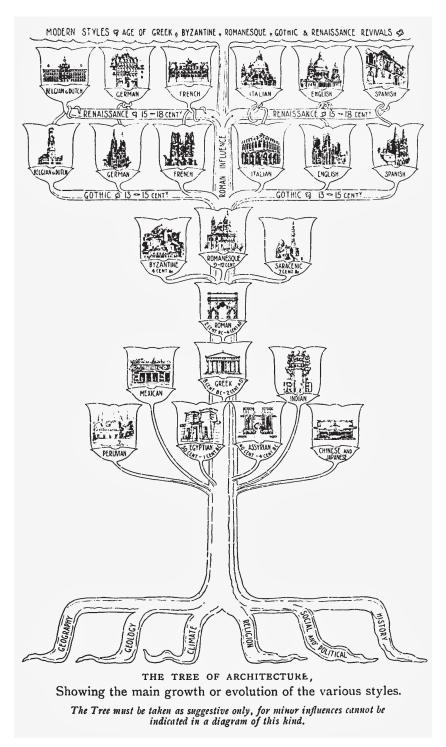


Figure I.3. Sir Banister Fletcher, "The Tree of Architecture," from A History of Architecture on the Comparative Method (1896).

In response to the social challenges of nation building, modern architects sought new ways of creating national architectural styles that could match the perceived transparency of historical vernacular forms and thus bind national culture. The scientific explanations for race types and cultural differences fundamentally challenged divine metaphors of the human body in neoclassical theories, which implicitly transformed the critical role of character judgments in the modern architectural style debates. Biological models of physiological development provided a privileged model for humanist conceptions of architectural invention that continued to reference the metaphorical figure of the human body to interpret architectural character in the present. By the end of the eighteenth century, scholars of natural history, philosophy, and art began to integrate physiological criteria for organic development such as skull shape, facial profile, skin color, and hair texture into their philosophical accounts for the invisible causes of human character. These efforts established a wide range of standards for representing the inner qualities of racial and ethnic groups in the imitative arts of painting and sculpture and they produced new rules for visualizing racial and national characters in the nonimitative art of architecture. The close disciplinary relationship between the fields of biology and anthropology also contributed to the interchangeability of race and nation as analytical terms for community that exceeded the limits of kinship relations and tribal laws. Georg Wilhelm Friedrich Hegel's Phenomenology of the Spirit (1807) and Arthur de Gobineau's The Inequality of the Human Races (1853) are just two of the most infamous examples of universal histories of Europe to employ racialized models of national development. Both authors used labels such as "the German race" or "the American race" to communicate the idea that national characters had become just as fixed as biological traits and were just as geographically and historically traceable. Subsequently, nineteenth-century practitioners of physiognomy, craniometrics, and phrenology employed ethnographical techniques of observation for identifying the constituent elements of national character within a population.

By the dawn of the twentieth century North American social workers were entrusted to socially engineer national character through the medical sterilization projects that attempted to eradicate so-called aberrant groups in society, from single mothers and political radicals to convicted criminals, using sanctioned state and federal funds. I argue that the medicalized treatment of the human body enculturated modern architects to expect new definitions for human character to have visual and political effects. The transatlantic theories of organic architecture examined below demonstrate the critical importance of the race concept in enabling modern architects to manage the visual expression of architectural character in seminal points of nation building. I argue that the racial interpretation of human character introduced new concepts of

embodiment and corporeality that implicitly revised the human-body metaphors of neoclassical architectural theory that previously served as inspirations for architectural design. This reading recovers the critical importance of race science in the historical transformation of Vitruvian architecture theory that were necessary for placing the humanist architectural traditions of the past on firmer ground in the present.

The explicit use of human-body metaphors in architectural design has a long history. As Caroline van Eck notes in Organicism in Nineteenth-Century Architecture, anthropomorphic metaphors for design date back to at least the first century in Vitruvius's Ten Books of Architecture, if not earlier in now lost Greek and Etruscan writings referred to by other theorists. Leonardo da Vinci's "Vitruvian Man" famously illustrates the belief in an unseen but all-powerful divinity that guarantees the laws of nature, and in turn the divine proportions of the human body that provided the aesthetic foundation for classical and neoclassical architectural styles. This antique tradition did in fact wane in the eighteenth and nineteenth century as historical knowledge of the past expanded. While postwar scholars have outlined the general influence of archaeology and anthropology on pluralizing the historical sources for eclecticism and revivalism in architectural debates, none have specifically located the constitutive role of the race concept in sustaining the conceptual importance of the human body as a relevant metaphor for design.8 Modern scientific explanations for human development inherently challenged the divine models of nature found in Roman treatises. While figures such as Wright claimed to have replaced the conceptual tools of Renaissance knowledge, they continued to see themselves as proponents of a humanist tradition in architecture. If we are to take this continuity seriously, then we must examine the conceptual bases upon which this tradition was perpetuated in the nineteenth century.

In this study, I argue that one of the most important and overlooked factors of the nineteenth-century humanist tradition in architecture is the influence of scientific conceptions of racial character on the continued disciplinary interest in the human body. A tide of new empirical models for physical development recast the importance of the human-body metaphor in architectural design. I explore the ways that the race concept suggested both physical and ephemeral modes of embodiment in architectural design. Race became a privileged concept in the paradigm of architectural organicism because it was perceived to be an empirical character of organic life that exhibited a wide range of representative qualities for human life: it was correlated to the inherent qualities of human thought and psychology; it became a fixed category in the study of human language groups; biologists applied it as a physical typology within the natural sciences; and ethnographers employed it as a term for categorizing the

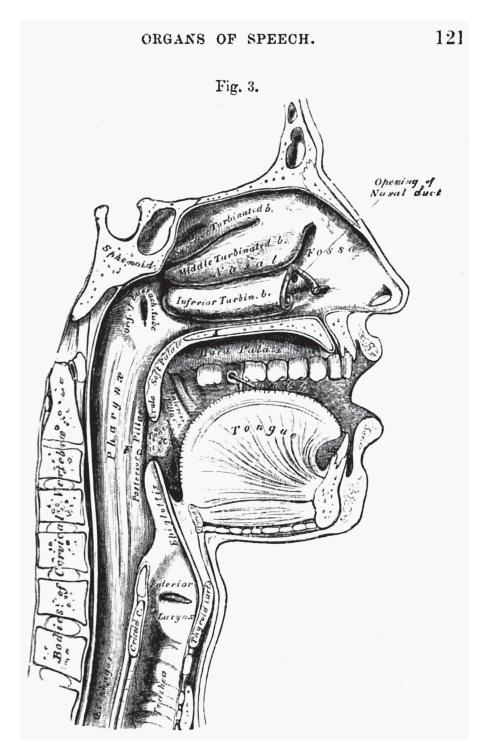


Figure I.4. Friedrich Max Müller, "Organs of Speech," in *The Science of Language*, vol. 2 (London: Longmans, Green, 1871), 121.

cultural differences of primitive peoples (fig. I.4). The birth of the Aryan migration myth is particularly telling in this context, as theorists in linguistics, as noted above, directly related their race categories to the human body's capacity to produce speech in the 1840s. Yet it was not until these inner workings of the body were directly overlaid with the strict typological categories of biology and ethnography in the 1850s and 1860s that the modern conception of the Aryan race was truly born. Contemporary Indo-European studies still continues to struggle with the cultural biases this disciplinary history suggests regarding the ethnographical character of the primitive race that supposedly migrated from the steppe mountains in the past.9

Within the realm of architectural theory, race types became a privileged empirical representation of nature's capacity for stylizing organic form, precisely because it placed the human being back at the center of humanistic discourses. Because of the nonvisual criteria that was often associated with the race idea in the nineteenth century, the conceptual realignment of neoclassical human-body metaphors within architectural organicism could proceed without the need for explicit visual references to the human body. Modern architects learned instead to personify the inert building materials of design as creating a metaphorical organic body in its own right. This enervated mass of material could now autonomously adapt the characters required to fit a regional context—the characters that were previously transferred to the building through a mimetic imitation of the human form (fig. I.5). In architectural writings of the nineteenth century, one is more apt to find explicit references to the embodied character of building materials, the personification of building forms, or the corporeal integration of architectural elements into an organic whole than any explicit references to the human body metaphors of neoclassical theories.

Despite this shift in descriptive tactics, however, these tendencies provide explicit clues to the avenues through which modern architects learned to borrow the methodological and representational standards of the natural sciences. From the time that Rudolph Virchow applied the statistical standards of Adolphe Quetelet's nominal study of human character to specific race types, the abstract mathematical representation of cultural differences had become a routine feature of nineteenth-century science. Instead of interpreting the paradigm of architectural organicism as marking a precipitous break with the human-body metaphors of neoclassical theory, this study examines the racialized human-body metaphors that were an implicit element of the scientific rationalization of architectural character. My approach establishes an alternative intellectual history for the architectural style debates that recovers the continued relevance of the human body within disciplinary debates that continued to preserve a humanist tradition of architectural design.

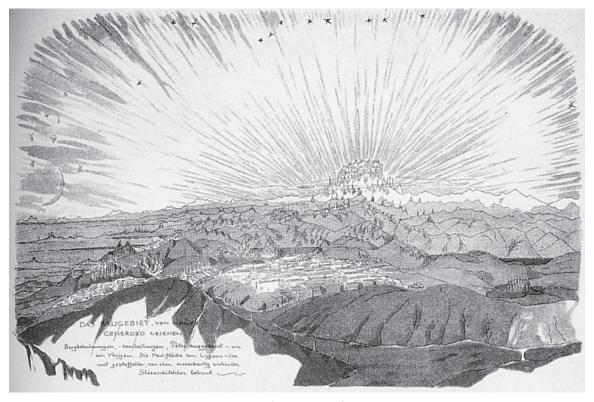


Figure I.5. Bruno Taut, Die Stadtkrone (The city crown), 1919.

The five architects examined in this study—Eugène Emmanuel Viollet-le-Duc, Gottfried Semper, Louis Sullivan, Frank Lloyd Wright, and William Lescaze—collectively defined architectural characters as a transparent reflection of the inner character of a national subject, sometimes the user of a building and sometimes the designer. This critical assumption makes it possible for us to infer a wide range of human-body metaphors that were necessary to transform neoclassical theories into a new methodological basis for architectural invention. Within the transatlantic political contexts of the nineteenth century, the racialization of architectural character directly enabled the modern architect to develop more regionally specific representations of the modern nation-state.

An important goal of this study is to outline the critical influence of race science on modern architectural theories and national architectural styles of the nineteenth century. These developments are examined within the transatlantic political contexts that gave birth to the European imperialisms and US settler colonialisms of this period. This book develops a nuanced interpretation of the critical importance of the race concept in personifying the notions of architectural character operating within the paradigm of architectural organicism—for

good or ill—to explain the practical methods designers used to manage architecture as a socially expressive art form. I chose the paradigm of architectural organicism for analysis because its leading theorists explicitly used scientific models of nature to update the metaphorical references that were necessary to reform the procedures of architectural invention. The relationship between race and style is most clearly demonstrated by the explicit citations that modern architects made to scientific theories of racial development to legitimize their evolutionary interpretations of cultural history. My examination of the disciplinary importance of the race concept builds upon the work of Martin Berger and Dianne Harris, which has examined the critical effects of white racial discourses on viewer interpretations of architectural spaces, both in the fine arts and in architecture, landscape architecture, and urban design. My research complements their accounts of the invisible ways that racial ideologies condition the visual interpretation of social norms by locating the formalist principles of design and the concepts of material embodiment that modern architects discovered in their study of the race concept.

In this book, I contextualize the hermeneutical function of the race concept in modern architectural theory by relating it to the principles of formal development it was associated with in scientific discourses. When proponents of architectural organicism defined style as the external expression of the underlying conditions of construction, the physical appearances of elements such as ornament, physical cladding, and colored surfaces were perceived to be surface registrations of the underlying ideas or cultural practices of premodern peoples. As modern ethnographical histories colored the meaning of these underlying conditions, these embodied characteristics increasingly became invested with more explicit racial associations in more nuanced and unpredictable ways. Using the scientific interpretation of racial character as a guide, I examine the implicit theoretical revisions to neoclassical human-body metaphors that were necessary to formulate the principles of French structural rationalism, German tectonic theory, the Chicago school of architecture, the Prairie Style, and the polemical definition of the International Style inaugurated at the Museum of Modern Art in 1932. Modern architects in Europe and the United States maintained the conceptual parallels that were established between the categories of race and style in the natural sciences in their textual correlation of racial and architectural characters in the invention of national architectural styles.

In the case studies I examine, each historical figure directly cites the developmental principles of ethnography, ethnology, sociology, or criminal anthropology to inflect racial interpretations of human character into architectural discourses. The cultural and nationalist overtones of Wright's readings of native character referenced in the epigraph are just one example of the sort of discourses that shaped the Euro-American paradigm of architectural

organicism. Beginning with Viollet-le-Duc in France and Semper in Germany, this book reconstructs the ethnographical models of architectural history that later influenced Sullivan's and Wright's organic architecture theories in North America. This intellectual history for architectural organicism foregrounds the modern architect's theoretical debt to the race concept as a result of the changing scientific contexts of the nineteenth century. Even when these architectural theorists do not explicitly use a visual representation of the human body in their writings, their visual representation of race types alongside those of vernacular building styles maintain the metaphorical parallel between nature and art that was central to the humanist architectural traditions of neoclassicism.

A study of the race concept in modern architectural debates also provides architectural historians with a useful lens for evaluating the subsequent racialization of International Style architectures that embodied national characters without making use of historical ornament. By the first two decades of the twentieth century, critics in the International Style debates challenged previous nationalist interpretations of architectural style for an outlook that seemed better suited to accommodate the emerging international avant-garde. Lescaze, a Swiss émigré to the United States, became a representative figure of this style in North America upon his inclusion in the Museum of Modern Art's 1932 exhibition on International Style. Despite his inclusion in this exhibit, Lescaze resisted Philip Johnson and Henry-Russell Hitchcock's formalist definition of the International Style by continuing the social and cultural commitments of European avant-gardes in the United States. His dogged advocacy for public housing in the New York City Housing Authority (NYCHA) also continued several critical projects of nineteenth-century architectural organicism, including the notion that the visual aesthetic of social housing communicates an organic ideal for mass culture in contemporary society. Lescaze demanded that, just like the organic architectures of Wright and Sullivan earlier in the century, his public housing transparently reflect the needs of its users while providing a physical context for enculturating local subjects into a hegemonic national culture. His efforts to popularize public housing in 1930s New York finally found mature physical expression in his design for Williamsburg Houses, which established a new urban type for this building typology in the NYCHA into the 1940s and 1950s.

Though he has never been explicitly associated with the ideas of nineteenth-century architectural organicism, I interpret Lescaze's public housing designs for the ways they nationalize the International Style for use as a tool for building up American citizenship. Williamsburg Houses ideologically bridges the pure aesthetic criteria that Johnson and Hitchcock believed constituted a universal style of building and the communal criteria that the social theorists Lewis Mumford, Catherine Bauer, and Clarence Stein believed were necessary for a public

architecture to organically emerge from its social context in the twentieth century as it had in the past. Mumford and Bauer's writings especially interpreted the humble brick surfaces of Lescaze's new urban type as an organic expression of the mass sociality then emerging in the modern world. As a representative type of American New Deal architecture, Williamsburg Houses constitutes an interesting example of the late influence of architectural organicism in the International Style debates of the twentieth century.

There were at least two complementary ways that scientific discourses on human character enabled the conceptual integration of race and style theory within the paradigm of architectural organicism—the one theoretical and the other material. In terms of modern architectural theory, scientific explanations for racial character transformed the critical importance of anthropomorphic metaphors for design by reinterpreting design as a simulated process of historical selection of vernacular type forms. Organic models of development were an important tutor for modern architects because they introduced typological interpretations of form that paralleled the empirical criterion of the natural sciences. The critical importance of racial typologies in the natural sciences mirrored the analytical value of vernacular typologies in architectural discourses, but especially in ethnographically inflected cultural histories where the material and expressive cultures of primitive peoples were used as a proxy for representing the cultural differences of premodern peoples. Within this intellectual context, modern architects' early desires to create a science of architectural design introduced the possibility of racializing the notion of architectural character in the European discourses on style. The practical function of type thinking was applied in architectural organicism through the credo that "architecture should imitate the methods rather than the forms of nature, in order to create the illusion of life."11 The conceptual parallels between racial typologies and vernacular typologies legitimized the authenticity of modern building designs by setting new scientific criteria for assessing how well buildings reflected the principles of nature.

In addition to ethnographical histories that reinterpreted the meaning of premodern aesthetic motifs, evolutionary models of historical change also personified the morphological transformations of architectural styles over time. In a sense, the building seemed to be self-aware in its search for a physical form that was both functionally fit and aesthetically pleasing to its local population. The composition of inert building materials into recognizable styles of architecture, usually interpreted through engineering principles of statics in construction in earlier phases of cultural history, was seemingly as steady, concrete, and predictable as the morphological transformation of organic types in nature. Goethe's theory of *Urpflanze* (the metaform for all plant life), Darwin's theory of natural selection, Bopp's organic theory of language, and Jacob Moleschott's

dietary regulations of human character all pointed toward universal laws for refining cultural forms. In the wake of strict materialist interpretations of nature, it became the job of the modern architect to shape architectural materials in accordance with these natural laws, to mirror the organic production of regional types that reflected the needs of and perhaps even conditioned the future form of regional populations. Only a rational and naturalistic process of design could produce the required methodologies for producing an authentic modern style, especially as the fall of Vitruvianism introduced confusion over what historical styles were still appropriate for use in the present.

Within this context racial interpretations of human character served as a heuristic category of interpreting architectural styles. The organic language found in modern architectural debates of the second half of the nineteenth century reveals the collective tendency of European architectural critics to depict the morphological transformations of vernacular building typologies in teleological terms, thus metaphorically investing them with an autonomous will or morphological faculty. The architectural concept of embodiment was further personified by the tacit associations of racial and national character in the sciences: architectural ornament and skin color were perceived to be parallel surface registrations of the invisible forces that shaped matter behind the scenes. The revival of stylistic motifs from architectural history constituted an explicit material strategy for recovering the lost aesthetic instinct of premodern racial and ethnic groups for use in the present. Such revivals attempted to renew the daily patterns of the immediate ancestors of contemporary nation-states by repeating the spatial and structural type forms of vernacular precedents uncovered in ethnographic and ethnological studies of the period. Modern architects used such strategies of design to ensure that the social protocols of the contemporary citizen would overlap with those of their ancestors—a material reinforcement of the national mythologies invented for unifying the masses and enculturating loyal modern subjects. If we can agree with Benedict Anderson that national myths are purposeful fictions created to indoctrinate the citizen-subject and shape the public sphere, then national architectural styles were an instrumental material form of shaping the cultural regimes for ordering the nation-state.12

As analogical bodies, organic architectures emulate the deep structural principles of nature that stylized the physical appearances of race types in the generative principles used to construct regional architectural characters. As rationally constituted spatial, structural, and ornamental constructs, organic architectures afforded the leadership of developing nation-states with material contexts to renew the life patterns of their cultural ancestors. In both modalities—as embodied fragments of the past and organically responsive contexts in the present—the spatial and structural elements of architecture did more

than hold up ornamental signs of national identity; they provided material proof of the renewed cultural legacies that architecture provides to accommodate the needs of contemporary culture. I outline in this book the ways that the transatlantic debates in architectural organicism privileged the physical embodiment and visual representation of the shifting boundaries of whiteness in modern architectural discourses. While I do not believe that the racial themes of architectural organicism are inherently white, I demonstrate the modern architect's consistent experimentation with regulating the public perception of whiteness in the public sphere. I argue that the case studies reviewed here constitute a historical tradition of white cultural nationalism in Europe and the United States that was sustained through a conscious desire to transform Western civilization as it marched across the globe. Locating the critical importance of racial discourses in architectural organicism does not taint its legacy or its revival in the present; it only enables contemporary designers to better understand how race and architecture meet one another in cultural debates. Perhaps this knowledge will enable us all to be more nimble and responsible in treating architecture as a social art.

The Scope of the Book

In part I of this book I examine the white cultural nationalisms associated with Alpine architectures uncovered in nineteenth-century Europe. The regional building styles of primitive mountain cultures were associated with scientific theories of a pure-blooded race of Aryan men who lived atop the Alps stretching across the entire length of premodern Europe. This fabled white Adam established a new origin point for tracing the historical evolution of national characters in modern Europe. Eighteenth-century scholars in linguistics and philology claimed that Aryanism dated back to primitive tribes of Hindus migrating westward from the steppes of India to various territories in Europe. Linguists analyzed what they perceived to be the organic behavior of Indo-European grammar to reconstruct the archetypal languages that emerged before the proliferation of agrarian culture. By the last three decades of the nineteenth century, biological and ethnographical theories of Aryanism supplemented language theories with visual illustrations of the material cultures of Aryan man—from his clothing and tools to his domestic and religious structures—providing a comprehensive matrix of material and expressive cultural artifacts of this lost culture.

This intellectual context paved the way for French and German architectural theorists to reconstruct the morphological transformations of primitive domestic and religious structures into the civic architectures of their times. Aryanism was a distinct feature of modern architectural debates that instrumentalized the cultural histories of ethnography to categorize the different

types of racial characters emerging between the competing nation-states of continental Europe. I explore the power of Aryan myths associated with the French and German Alps during the nineteenth century. In the French case, Protestant theorists traced the historical origins of republican political ideals back to remote Aryans, while in the German case the existence of a common historical origin for the surviving fragments of the Ottoman Empire provided hope that the confusing pluralities of the contemporary nation state could be overcome by a principled return to the past.

The first two chapters of this book outline the theoretical transformations of Vitruvian anthropomorphism that were established by the scientific references of Viollet-le-Duc's theory of structural rationalism and Semper's conception of tectonic theory. The explicit citations of Aryan migration theory and illustrations of primitive wooden structures found in the Alps demonstrate the analytical value of ethnography in the architectural style debates.

Chapter 1 examines the writings and architecture of the French architect Eugène Emmanuel Viollet-le-Duc. For Viollet-le-Duc, the Aryan migration theories of the 1850s and 1860s established an exciting new historical origin for his unconventional historical interpretations of the religious and domestic typologies of the past. After publishing many books on the history of medieval France, including his multivolume *Dictionnaire raisonné de l'architecture française*, he published a popular work titled *Histoire de l'habitation humaine* that outlined a cultural history of domesticity from the ancient world to the Renaissance. *Histoire* combined the illustration of human race types with that of vernacular building types to demonstrate the common "organic" principles of cultural evolution.

In honor of his Aryan ancestors, Viollet-le-Duc designed and constructed a modernized version of the wooden Swiss chalet for his personal use in Lausanne, Switzerland, the location of his late commissioned cartographic studies of the French Alps. The design, which he called La Vedette, reconstituted the overall massing of the chalet type using a new masonry frame. The primitive roots of this aesthetic were revealed by the pictorial representation of the migration routes of his Aryan ancestors in a panoramic mural completed in the first-floor salon of his home. The architectural strategies Viollet employed to revive the old migration patterns of Aryan man and domestic patterns of French medieval life emulated his evolutionary interpretation of cultural history, which he believed influenced the design of all things in the present, for only a theory of living matter could produce a living architectural tradition.

The complexities of German nationalism were likewise managed by creative applications of character judgments in the architectural style debates. Chapter 2 examines the writings of the 1860s, before Germany became a unified nation-state. During this period, Germany consisted of a federation

of independent kingdoms and principalities separated by a host of distinct language groups, religious customs, and political ideologies. The economic influence of its Zollverein, or toll-free customs area, which was established to promote free trade among its member states, was not a sufficient political framework to establish a unified hub for governing Germans.

This fraught political context provides the backdrop for Dresden architect Gottfried Semper's ethnographical interpretation of architectural history. Semper believed that a scientific study of the past might offer him an empirical avenue for discovering the common roots of German culture, one that was capable of connecting both the Prussian-controlled Protestant north and the Catholic kingdoms of the Austro-Hungarian south. Emulating the comparative methodologies of ethnography and ethnology, Semper treated architectural design as a practical arm of racial anthropology that taught architects to reconstitute the artistic type-forms of the past in modern materials. His architectural style was marked by a principled revival of the monumental forms of the Roman Empire, which I interpret as an aesthetic revival of German national character as it existed under a strong historical empire. His Roman revivalist building style also cemented new political ties by enabling secularized German-speaking Jews to assimilate within the elite ranks of the nation-state.

Semper also inflected the mythologies of Aryanism in his search for primitive type-forms in architectural history. Following the finds of the Greek revivalist architect Leo von Klenze, Semper claimed that the Bavarian-Tyrolean hut was an autochthonous type of Alpine housing that served premodern Germans during their vast migrations from the Alps to the plains below. His fascination with the origins of German culture provided the grounds for appreciating non-German material cultures, including those discovered during the nation's brief experiment with colonialism. Semper's citation of the material culture of South Sea Islanders anticipated the later subjugation of Māori tribes in colonial territories after the decline of democracy in Weimar Germany.

In part II of this book I examine the racial discourses associated with the transatlantic disseminations of architectural organicism in North America at the turn of the century. American theorists believed that an autochthonous style of building was sure to arise with the gradual refinement of the democratic experiment. However, pressing questions emerged from social theorists regarding the potential longevity of European racial character in the New World. While some believed that modern Europeans would literally degenerate under the harsh conditions of the American prairie, others hoped that this geography might give rise to an entirely new form of national identity that would extend the reach of Western civilization across the Atlantic. Would the American race be defined by the best racial stock of Europe, segregated in distinct enclaves in its new woodlands and outstretched plains, or would patterns of racial amalgamations

produce a new American race without precedent in the Old World? European ethnographers and political theorists analyzed the state of affairs through the state of contemporary arts and letters, which served as a visual sign of the health and vibrancy of this new nation. Several American innovators labored in adapting the principles of European architectural organicism to fit their situation in the United States. The political shift in the United States toward the ethnicization of white racial identity was manifest in the architectural style debates by a material transition from the privileged ornamentation of structure in national building styles to the racialization of interior spatial and structural components veiled behind the monolithic planar finishes of the International Style. In the course of this transition, the aesthetic values of nineteenth-century architectural organicism survived to complicate the synthetic pan-European interpretation of the international avant-garde popularized by Johnson and Hitchcock in the 1932 exhibition at the Museum of Modern Art (MoMA).

Chapter 3 traces the transatlantic dissemination of French and German theories of architectural organicism to North America via professional émigrés and authoritative translations of European writings beginning in the mid-1850s and early 1860s. These sources exerted an indelible influence on the materialization of self-described American architectural styles. Yet the distinct political context of the New World provided some unique challenges to translators of European architectural theory. The mix of racial and national origins caused by intermarriage in the United States established a new type of postcolonial identity that was constituted by an amalgamation of distinct European characters. American architects employed a range of aesthetic strategies that expressed what they perceived to be the unique state of American character.

The Irish American architect Louis Sullivan pioneered what I describe as a physiognomic approach to architectural style that uses carved floral ornamentation to visually index the embodied spatial and structural properties of democratic spaces. Sullivan's interpretations of American character were inevitably influenced by the racial politics of his era, which luminaries such as Ralph Waldo Emerson and Walt Whitman credited to the Anglo-Saxon roots of American democracy. The political self-determinism demonstrated by New England's early settlers was theoretically open to all of its citizens, although in practice it was reserved for the subjects who were deemed capable of assimilating the English political heritage that enabled them to successfully manage these responsibilities. Within the context of the expanding American republic, the racial and political criteria used to determine the vicissitudes of American character elevated certain social groups into leadership positions within the modern political elite. Realizing the social stakes of white racial identity, Sullivan used his autobiography to distance himself from his father's Irish heritage in order to qualify himself as the premier architect of his generation.

This prejudice against Irish character persists in Sullivan's negative depiction of Old World immigrants and nonwhite peoples whose characteristics strayed too far from the Anglo-American ideal. Despite the exclusive categories of Sullivan's architecture theory, however, his Jewish clients and the subsequent occupation of his buildings by African Americans posthumously expanded his notion of the body politic by physically reforming the most restrictive formal elements of Sullivan's architectural style. The formal additions and renovations of this space were prompted by the new spatial protocols that were a symptom of the political struggles of America's most marginalized communities. A close examination of Sullivan's architectural oeuvre should sensitize architectural historians to the ways that the historical uses of monumental spaces challenge the critical assumptions of the architect, sometimes to the advantage of his or her architectural theories.

Taken together, the case studies of the first three chapters demonstrate a deep and continuous romantic tendency within architectural organicism to create modern architectural styles that transparently reflect the inner characters of a dominant racial genius within the nation state. Even as twentieth-century theorists dispensed with the natural metaphors of the nineteenth century to pursue the machine metaphors of the International Style debates, the racial connotations of the term *organic* continued to align the properties of race and style in the material and spatial elements of modern architecture as American power expanded around the world. The racial charge of modern architectural styles was partially manifest in a struggle between the nationalist and internationalist themes of exhibits at MoMA during the interwar and postwar periods. The 1932 exhibit on the International Style, titled Modern Architecture: International Exhibition, polemically opened the way for the popularization of International Style architectures in the United States. While the European pedigree of the International Style initially served as an obstacle for American decisionmakers' acceptance of it, the curators, Johnson and Hitchcock, worked tirelessly during the 1940s and 1950s to isolate the idiomatic elements of this style that would best fit the intellectual and institutional contexts of the United States. Yet it was not entirely clear whether the presiding character of this movement was to be American or international in focus. A brief look at the early exhibitions of the Department of Architecture at MoMA reveals the conflicted identities associated with this movement as its curators alternated between crediting the transmissibility to its international tendencies and its development as a unique form of American modernism.

Such tensions were visually manifest in early International Style projects such as Lescaze's aesthetic solution for Williamsburg Houses, the first publicly funded housing project in New York City. Lescaze, who was celebrated for his design of the Philadelphia Savings Fund Society building in Philadelphia,

achieved an aesthetic unity between social housing in Europe and the United States in his design for Williamsburg Houses in New York City, which effectively Americanized the whitewashed modernist aesthetic pioneered at MoMA in 1932. Despite the strict design protocols outlined by the federal department of housing, Lescaze maintained a visual tension between the brick detailing that Mumford and Bauer describe as an "organic" material expression of the communal character of mass culture in the twentieth century and the concrete shelving of its structural frame that was more prominent in middle-class housing experiments overseas. Both of these material qualities came together to from the requisite platonic volumes mandated by the International Style show. By not completely sacrificing the architectural detailing of nineteenth-century social housing projects in his design, the hybrid style of Lescaze's project continued to provide a human scale for modern housing that indexed the progressive legacy of earlier social movements.

Lescaze's formal attempt to Americanize International Style public housing was negatively affected by the racial discourses of his time. As I suggest in chapter 4, race and style were brought together by virtue of two distinct institutional forces: the segregation policies of most federal and state housing departments in the United States and the European pedigree of the International Style show that gestured toward the white ethnic diaspora in New York City. While the segregation policies of public housing did not cause the pan-European pedigree of the MoMA show, and vice versa, the combined racial charge of these institutional contexts affected the Americanization of working-class white and black residents in oppositional ways: while it consolidated the cultural diversity found within working-class white immigrants of the interwar period by acculturating them to the social standards of middle-class whites, working-class blacks were shut off from the economic gains achieved by racially integrated unionization efforts that were open before the birth of public housing.

The racial character of public housing across the United States colluded to permanently taint the popular reception of Lescaze's organic representation of working-class culture. Instead of becoming an emblem for social uplift among the working classes collectively, Williamsburg Houses became a sign of the positive racial character of working-class whites, as new immigrants and members of the "submerged middle class" moved on from public housing to suburban bungalows. By contrast, the institutional exclusion of black workers from the social and economic gains of the postwar period transformed public housing into a visual sign for the permanent unfitness of working-class blacks as a group. The downward social and economic trajectory for black residents living in modernist public housing units took even clearer visual form once the artistic prestige of designing these structures declined within the avant-garde in the 1940s and 1950s. I argue that the deteriorating material conditions of public

housing that were retroactively linked with the perpetual otherness and poverty of black residents were structurally conditioned by the racial pedigree of the International Style exhibit at MoMA. This situation was exacerbated by the decision of public housing advocates to focus on class over race in their efforts to build support for local construction efforts in the United States.

Beginning with the canonical *Modern Architecture: International Exhibition* of 1932, in the conclusion I revisit the racial connotation of "organic" language and practices in curatorial themes of modern architecture exhibits at the MoMA. A close reading of the American themes of these exhibits demonstrates the historical continuity of racial interpretations of international style architectures of the interwar and postwar periods. Philip Goodwin and Elizabeth Mock's 1945 exhibit *Built in USA:* 1932–1944 is read as an explicit referendum on the formalist criteria that Johnson and Hitchcock used in 1932 to define the International Style. Mock establishes a domestic lineage for American modernism that predates the European invasions of the 1930s. This alternative narrative credits Wright's organic architecture with continuing the nationalist trajectory of earlier practitioners, including that of his mentor, Sullivan.

This book provides a brief overview of the ways Wright's An Autobiography emulates the racial themes of Sullivan's Autobiography of an Idea: both architects subscribe to a romantic vision of the American frontier that casts a pessimistic view on the inherent potentials of first-generation white immigrants and non-white peoples at the turn of the century. A close reading of Wright's text also reveals the profound whiteness of his agrarian conception of the Prairie Style, which anticipates the racially segregated character of his designs for the domestic interior, as well as colors his emulation of Japanese, Chinese, and Mayan material culture in his architectural ornament. I have selected the design of the Imperial Hotel in Tokyo as a fruitful case study for examining this phenomenon.

In the conclusion, I examine the racial interpretations of American character that are manifest by the organic language of the International Style debates. While these architectural critics did not always make direct references to the generative principles of the natural sciences, they did attribute a set of essential characteristics to the American practitioners who completed the most iconic projects of the postwar period. One of the professional types that Johnson and Hitchcock invented to distinguish American designers from their competitors in the international avant-garde was the figure of the "businessman-architect," who was responsible for shaping the corporate and political architectural programs that marked the rise of American internationalism. I examine the ways that this social type recalls the racial tropes of American pragmatism in the late nineteenth century, which attributed positive values to the Protestant work ethic and humble demeanor of the white working classes. This line of thinking is manifest in Hitchcock's essay for the *Built in USA: Post-war Architecture*

exhibit, where he cites Wallace K. Harrison as a representative of this new breed of American practitioner. While the physical appearance of Harrison's architecture does not diverge from Johnson and Hitchcock's formalist conception of the International Style, the architectural character of this project is ultimately credited to the synthetic design process responsible for its making.

Several architectural critics and journalists described Harrison's deliberative approach to the design for the United Nations complex as an "organic" integration of competing aesthetic ideas. This notion of organicism—a synthetic integration of various elements into a unifying whole—procedurally emulates the synthetic design strategies that organic architects deployed nearly two generations earlier in the United States. Despite the perceived architectural genius accorded to individual members of the UN design committee—including the famed Le Corbusier, who wished to advance his own design for the project after failing to complete the Palace of the League of Nations—Harrison prevailed by synthetically integrating small gestures from multiple designers into a single aesthetic vision. I interpret this use of organic language as Hitchcock's attempts to identify the native genius of American designers that placed them ahead of other competitors from other national regions. While architectural historians have already examined Harrison's design approach for prefiguring the "democratic" function of the United Nations, I examine the racial discourses that emerged from his manifestation of American pragmatism as the native genius of the American businessman-architect. In the wake of the sociological consolidations of whiteness I describe in chapter 4, the racial politics of this moment continue to distinguish American native genius within an international political context.

Identifying the racialization of architectural character in the nine-teenth-century paradigm of architectural organicism makes it possible to demonstrate the lateral influence of organic discourses on the International Style debates in the first half of the twentieth century. Once the scientific rationalization of modern architectural theory made race and style two empirical and interconnected entities in cultural history, it was hard to break the expectation that racial characters and architectural characters would continue to parallel one another in a progressive modernist history. Even when architects no longer looked directly to nature to provide them with explicit metaphors for design, the modern architect was forced to reintroduce this idea through other means in order to substantiate the individuality of American cultural production within the international avant-garde.