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The Collaborative Divide: Crafting Architectural Identity, Authority, and Authorship in the Twentieth Century

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The Collaborative Divide:
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by

Steven I. Doctors

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Committee in charge:

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ABSTRACT

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The object of study in this dissertation is a discourse promulgated by architects for much of the twentieth century that assigned transformative attributes to collaboration relative to the purpose and potentiality of the profession. Underpinning these aspirations was an assertion of the fundamentally collective character of architectural production, yet realization of the purported transformative promise of collaboration recurrently fell short of its idealization. My intention here is to examine this historical divide by considering: motivations fueling the idealization of collaboration; its engagement in the crafting of architectural identity, authority, and authorship; the mechanisms of professional and state authority employed in its promotion and dissemination; and the socio-economic forces acting upon practice that precluded realization of its transformative promise.

To enter into this topic, I draw upon primary archival materials to construct an historical narrative contextualized by socio-economic and political forces, with an emphasis on protagonists whose contributions to the American discourse on collaboration are most representative of specific moments in the twentieth-century. In each instance, the idealization of collaboration operates at the boundaries of the profession, the edges where architects affirm the collective nature of architecture by engaging with non-architect 'others' in the conception and production of buildings. Tensions between the advocacy of collaboration as a transformative means and concurrent quests to articulate the identity, authority, and authorship of the architect tell us much about the efficacy of collaboration as a signifier of collective action, how architects wished to be viewed by non-architect 'others,' and more broadly, the implications when theories of practice differ from their realization. I begin at the close of the nineteenth century with a prevailing historicist paradigm that glorified architecture as art and a concomitant agenda of collaboration intended to resist the temptations of an emerging modernism. In the second case study, I examine modernist dominance of the Depression-era discourse, and competition between collaboration and cooperation as the ideal basis of collective action for social change. In the third and final case study, I consider the rise of a process-oriented collaboration stripped of stylistic affiliations in a post-Second World War milieu in which techno-military accomplishments and a burgeoning global American presence inspired seemingly infinite possibilities for architecture as a science-based profession.

The principal contribution of this dissertation is a foregrounding of the historical problematics of collaboration specifically as it pertains to architects in their engagement with non-architect 'others.' By examining tensions between the architectural promotion of collaboration and the crafting of architectural identity, authority, and authorship, I establish a framework for assessing the twenty-first century re-emergence and idealization of collaboration as a transformative practice, in this instance, one characterized by connectivity empowered by information and communication technologies.

dedicated to
my wife and daughters

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LIST OF ILLUSTRATIONS AND CREDITS

LIST OF ABBREVIATIONS

List of Archives

Avery Architectural and Fine Arts Library, Columbia University
(Avery Library)
Bancroft Library Archives at the University of California - Berkeley
(Bancroft Archives)
La Guardia and Wagner Archives, La Guardia Community College/City University of New York
(NYCHA Collection)
Rare and Manuscript Collections, Carl A. Kroch Library, Cornell University
(Cornell Archives)
Special Collections Research Center, Syracuse University Library
(Syracuse Archives)
The Archives of the Episcopal Diocese of New York at the Cathedral of Saint John the Divine
(Episcopal Archives)
Yale Collection of American Literature, Beinecke Rare Book and Manuscript Library
(Beinecke Library)

Governmental Agencies

Architects' and Technicians' Organisation (ATO)
Emergency Fleet Corporation (EFC)
Federal Emergency Administration of Public Works (PWA)
New York City Housing Authority (NYCHA)

Professional Associations, Groups, and Phrases

Air Raid Precaution Campaign (ARP)
American Institute of Architects (AIA)
Building Information Management (BIM)
Congrès International d'Architecture Moderne (CIAM)
Federation of Architects, Engineers, Chemists, and Technicians (FAECT)
Integrated Project Delivery (IPD)
Modern Architectural Research Group (MARS)

Journals

American Architect and Building News (AABN)
Journal of Architectural Education (JAE)
Journal of the American Institute of Architects (AIA Journal)
Journal of the Society of Architectural Historians (JSAH)

INTRODUCTION

It is beneficial to clarify at the outset that the topic of this dissertation is neither collaboration nor architecture as practiced. Rather, it is the architectural profession as imagined through the lens of collaboration. More specifically, the object of study is a discourse promulgated by architects for much of the twentieth century that assigned transformative attributes to collaboration relative to the purpose and potentiality of the profession. Underpinning these aspirations was an assertion of the fundamentally collective character of architectural production, yet realization of the purported transformative promise of collaboration -- variously aligned with the arts and sciences, and with historicism and modernism -- recurrently fell short of its idealization. My intention here is to examine this divide by considering: motivations fueling the idealization of collaboration; its engagement in the crafting of architectural identity, authority, and authorship; the mechanisms of professional and state authority employed in its promotion and dissemination; and the barriers of practice precluding realization of its transformative promise.[1] The implication is that, absent full consideration of these problematics from the past century, the twenty-first century re-emergence of collaboration as a transformative mechanism -- notwithstanding its intimate engagement with information and communication technologies -- is bound to perpetuate the collaborative divide.

Collective Action and Transformation

Before delving into this collaborative divide, however, I must begin more broadly with collective action, that is, an array of practices and relationships by which individuals operate together.[2] These collective practices and relationships past and present -- exemplified by collaboration, cooperation, contribution, coordination, teamwork, and association -- are ubiquitous in the physical, social, and political sciences as well as in the literary, visual, and performing arts. Collective action was as prevalent in the nineteenth-century ascent of the modern professions when social clubs and shared-interest societies were the predominant venues as it is in the twenty-first century when such practices are just as likely to be conducted in virtual settings. Indeed, the very structural manifestations of professionalization -- formalization and dissemination of specialized knowledge through training and journals, regulation of entry by licensure, and advocacy by a representative organization -- may be seen as the outcome of collective action coupled with motivation to transform the status quo. While these structural manifestations bear similarities across disciplines, the principal context of transformation -- social, economic, political, spiritual, physical, behavioral, ethical -- varies widely, often finding commonality only in its elusiveness.

In his study of the early legal profession, for instance, Michael Burrage depicts collective action as the means by which practitioners in the American colonies sought to articulate a

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[1] By identity, I refer to the articulation of a distinct body of knowledge and services distinguishing the architect from other participants in the design and construction of the built environment. By authority, I refer to the socio-economic and legal privilege to dominate and control the process of architectural production. Finally, by authorship, I refer to principal attribution in the public and professional realms for the outcome of that process.

[2] For a discussion of formal theoretical models of collective action and a review of collective action theory since the seminal work of Mancur Olson in the 1960s, see Pamela E. Oliver, "Formal Models of Collective Action," *Annual Review of Sociology*, vol. 19 (1993), 271-300.

distinct identity amidst a confusing array of British barrister and attorney models of practice.[3] Susan Dorr Goold theorizes compelling patient-centric arguments for collective action among medical practitioners on matters of compensation, autonomy, and working conditions, but notes that prevailing economic, political, and ethical forces engaged in and acting upon health care nonetheless preclude such actions in practice.[4] Jill Dolan speaks of collective action from yet another perspective; a paradigm seeking to transform the neutrality of theater into a performer/participant venue for "meaning-making and imagination . . . of a better world," despite apparent obstacles to motivating audiences gathered as ephemeral communities.[5]

In the realm of architecture, collective transformative endeavors are no less diverse and seemingly no more realizable than their counterparts, operating on a breadth of scale from individual object to vast regional intervention. Such quests to create or alter spaces for "future forms of social life," as David Harvey characterizes the transformative essence of architectural production, bring to mind William Morris's aspirations for a society in which architecture is both contributory to and reflective of a "new era of social cohesion and a new code of human values."[6] Magali Sarfatti Larson notes an early modernist obsession with the "transformative capacity of the arts" in fostering a "new society," while Susan Buck-Morss writes of a Cold War vision of global proportions, an "optimistic vision of a mass society beyond material scarcity, and the collective, social goal, through massive industrial construction, of transforming the natural world."[7] More recently, editors of *Artforum* published six proposals for the re-building of post-hurricane New Orleans by Huff + Gooden, UN Studio, Morphosis, West 8, and Hargreaves Associates. Although deemed "visionary," the editors presented the proposals "in the spirit of possibility and in a long-standing tradition of collaborative, idealistic endeavors in the arts, which have in previous era provided the germ of inspiration for public works."[8]

This transformative potential of architecture -- Alberto Peréz-Gómez argues it can "be paraphrased poetically but . . . impossible to explain systematically" -- may be further exemplified by the insatiable modernist notions of 'complete building' or 'total design.'[9] Karsten Harries offers that Walter Gropius, while aware of its fantastical nature, nonetheless argued for

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[3] Michael Burrage, *Revolution and the Making of the Contemporary Legal Profession: England, France, and the United States* (Oxford and New York: Oxford University Press, 2006), 9.

[4] Susan Dorr Goold, "Collective Action by Physician: Beyond Strikes," *Cambridge Quarterly of Healthcare Ethics*, vol. 9 (2000), 498-503.

[5] Jill Dolan, "Utopia in Performance," *Theatre Research International,* vol. 31, no. 2 (2006), 164.

[6] David Harvey, *Spaces of Hope* (Berkeley and Los Angeles: University of California Press, 2000), 200; and Phillippa Bennett, "The Architecture of Happiness: Building Utopia in the Last Romances of William Morris," *Spaces of Utopia: An Electronic Journal*, no. 4 (Spring 2007), 115.

[7] Magali Sarfatti Larson, *Behind the Postmodern Façade: Architectural Change in Late Twentieth-Century America* (Berkeley: University of California Press, 1993), 32; and Susan Buck-Morss, "The City as Dreamworld and Catastrophe," *October*, vol. 73 (Summer 1995), 3. For a discussion of the CIAM program linking architectural, urban, and societal transformation, see Eric Mumford, *The CIAM Discourse on Urbanism, 1928-1960* (Cambridge, MA and London: The MIT Press, 2002).

[8] As cited in Yates McKee, "Haunted Housing: Eco-Vanguardism, Eviction, and the Biopolitics of Sustainability in New Orleans," *Grey Room,* vol. 30 (Winter 2008), 92. For a discussion of three models of architectural utopia, see Thomas R. Fisher, *The Scheme of Things: Alternative Thinking on the Practice of Architecture* (Minneapolis and London: University of Minnesota Press, 2000), 13-18.

[9] Alberto Peréz-Gómez, *Built Upon Love: Architectural Longing After Ethics and Aesthetics* (Cambridge, MA and London: The MIT Press, 2008), 143.

the 'complete building' as a principal motivation for architecture engaged in societal reform.[10] Mark Wrigley insists that 'total design' -- manifested either as the "focusing of design inward on a single intense point" or "expansion of design out to touch every possible point in the world" -- is an idealization of collective action with the architect in control of "centralizing, orchestrating, dominating" spatial and societal transformations.[11] In each instance, as with the accounts by Harvey, Morris, Larson, Buck-Morss, and editors of *Artforum*, the improbability of realization seems not to dissuade architects from a faith in the transformative power of collective action.[12]

This sets the groundwork for several initial premises. First, that architects have long embraced collective action as a transformative mechanism motivated by diverse societal, environmental, stylistic, and professional outcomes; secondly, that of a litany of signifiers for collective action -- cooperation, contribution, coordination, teamwork, etc. -- collaboration has been the most problematic, attributable to a sustained and expansive divide between its idealization and realization; and thirdly, that this collaborative divide serves metaphorically not only to depict a gap between idealization and realization, it also characterizes the assertion rather than easing of disciplinary boundaries between architects and non-architect 'others' embedded in the twentieth-century promotion of collaboration.

In the aggregate, these premises foreground a fundamental paradox. Collaboration is, on the one hand, a persistent and persuasive reminder in the professional consciousness that architecture is not produced in isolation, yet it is simultaneously a recurring reaction against normative architectural practices that privilege individual identity, authority, and authorship over that of the collective.[13] Compounding this paradox is the collapse of semantic distinction amongst various signifiers of collective action. While such linguistic fluidity may be seen positively as enabling new temporally and culturally-relevant interpretations, the resulting semantic confusion serves to inhibit rather than enhance consensus of meaning, ostensibly a prerequisite for collective action. Architects and scholars of the profession alike unwittingly perpetuate this semantic confusion by indiscriminately employing these terms synonymously,

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[10] Karsten Harries, "The Dream of the Complete Building," *Perspecta*, vol. 17 (1980), 40.

[11] Mark Wigley, "Whatever Happened to Total Design?" *Harvard Design Magazine*, no. 5 (Summer 1998), re-print 2001, 1.

[12] Harvey employs the metaphorical framework of utopia in his discussion of architectural production, as its internalized contradiction etymologically rooted in 'no-place' and 'ideal place' succinctly depicts the dichotomy between the idealization and realization of transformative programs. While architectural representation of utopia -- in contrast with the "ideal society" originating with Thomas More prevalent in the literary arts or the Baconian technological iteration in the sciences -- tends toward the imposition of order over chaos through the manipulation of form and material, the problematization of utopia, he points out, need not be restricted to spatio-physical terms. Rather, as Amy Bingaman, Lise Sanders, and Rebecca Zorach suggest in their inquiry into the dynamics of individual body and built environment, utopianism may be viewed as both "social activity and thought process" (Amy Bingaman, Lise Sanders, and Rebecca Zorach, *Embodied Utopias* (New York and London: Routledge, 2002), 1) In the same vein, Harvey suggests that the "failure of realized utopias of spatial form can just as reasonably be attributed to the processes mobilized to materialize them as to failures of spatial form per se." This leads Harvey to argue for a spatio-temporal approach to utopia, in which the materiality of place and the social processes of its realization come under equal scrutiny and in dialectical relationship (Harvey, *Spaces of Hope*, 173). For further comparative discussion of utopia as depicted in the literary arts, sciences, and architecture, see William Alexander McClung, "Dialectics of Literary Cities," *Journal of Architectural Education*, vol. 41, no. 3 (Spring 1988), 33-37.

[13] For Dana Cuff, the first of several "dualities" in architectural practice is that of the individual/collective, "tapping into the contrast between architecture's fundamental respect for the autonomous artist and its use of teams of professionals to do the actual work for any project" (Dana Cuff, *Architecture: The Story of Practice*, Cambridge, MA and London: The MIT Press, 1992, 11).

inequitably, or without specificity of meaning. The Swiss historian Siegfried Giedion, for instance, in his introduction to Jose Luis Sert's 1942 text on the Functionalist City, depicts CIAM's first gathering after the 1928 La Sarraz Declaration as "a congress based on collaboration, not a congress in which everyone merely contributes circumscribed knowledge from his own special field, as in the nineteenth century."[14] Giedion calls attention here to a distinction between two collective action terms -- collaboration and contribution -- and between a twentieth-century iteration of collaboration and that of a prior century. An absence of clear meaning, however, makes it difficult to enter into the specificity of that moment to comprehend these distinctions and the consequences for architectural practice. Similarly, Gropius, long held by scholars as a leading proponent of collective action, professed that "the art of building is contingent upon the coordinated teamwork of a band of collaborators whose orchestral cooperation symbolizes the cooperative organism of what we call society."[15] Here, Gropius struggles with the inadequacy of not just one but four signifiers of collective action -- coordination, teamwork, collaboration, cooperation -- in a seemingly redundant effort to articulate a vision of architectural practice.

While this semantic confusion may hinder consensus on collective action, the existence of multiple signifiers and meanings is not the principal issue here. As Adrian Forty observes, words enter the architectural lexicon only to be transformed over time in variable contexts of theory and practice. He speaks of a "phenomenon" of language characterized by "the constant flux between words and meanings, of meanings' pursuit of words, and words' escape from meanings."[16] 'Function,' for instance, crossed as a metaphor from mathematics and biology into architectural usage in a strictly tectonic sense through the end of the nineteenth century, after which it bore a more polemical inference involving the human/building interface.[17] 'Structure' referred to the "internal organization" of the body before its adoption as an architectural term in reference almost exclusively to the entire building. It was not until the latter half of the nineteenth century that its meaning narrowed to the supporting framework of a building, and later, more abstractly, to the organizing framework of a plan of action on most any scale.[18]

Articulation of the Problem

Rather, the central problem prompting this study is that architects continue unabated in the twenty-first century to assign transformative aspirations to collaboration without interrogating its significance to the architectural profession past or present. The problem -- and the relevance of this study -- may be distilled to two principal components. First, in the contemporary discourse, architects idealize collaboration as superior to other modes of collective action and as a means to enable participation in a free-flowing model of information and

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[14] José Luis Sert, *Can our Cities Survive? An ABC of Urban Problems, Their Analysis, Their Solutions: Based on the Proposals Formulated by the CIAM, International Congresses for Modern Architecture, Congrès International d'Architecture Moderne* (Cambridge, MA: Harvard University Press, 1942), ix.

[15] Walter Gropius, *The New Architecture and the Bauhaus* (London: Faber and Faber Ltd., 1935), 57.

[16] Adrian Forty, *Words and Buildings: A Vocabulary of Modern Architecture* (New York: Thames and Hudson, 2000), 14.

[17] Ibid., 174-195.

[18] Ibid., 276-285; and Antoine Picon, "Architecture, Science, Technology, and the Virtual Realm," in Antoine Picon and Alessandra Ponte, eds., *Architecture and the Sciences: Exchanging Metaphors* (New York: Princeton Architectural Press, 2003), 294.

knowledge production facilitated by advanced technologies and global communication networks. Following Coyne, romanticized digital narratives aggravate this idealization with presumptions of horizontal decision-making across temporal, spatial, and disciplinary boundaries. This imagery, however, contrasts sharply with the hierarchical, methodological, legal, and regulatory realities of a profession still vested in an older model of practice, one that ostensibly sustains the identity of individual architects and grants them authority and authorship of both the process and outcome of architectural production. It ignores, moreover, indications that technological advancement may not correlate to an equitable distribution of knowledge or to enhanced performance and outcome, despite the substantial investment of human and financial resources into robust technologies such as Building Information Modeling (BIM) intended to nurture these very attributes in a global marketplace.[19]

Coupled with this idealization of collaboration in the contemporary discourse is a second critical component of the problem prompting this study. As I shall demonstrate, despite the ubiquitous appearance of the word 'collaboration' in scholarship and journal articles on the profession, the discipline of architecture lags in scrutinizing its historical relationship with collaboration, a sentiment echoed by Sharon Helmer Poggenpohl, professor of design and editor of *Visible Language*, in observing that "collaboration has an interesting, if largely unwritten, history in design."[20] This is remarkable given the immense transition in practice from the Vitruvian generalist to the twenty-first century specialist, and corresponding changes in the relationships between architects and others engaged in the design and construction process. The earliest medieval architect-designers, for instance, distinguished themselves by their design skills from the anonymous ranks of craftsmen and guild members, but the dearth of detailed drawings and a reliance on large-scale models necessitated the architect-designer's almost continuous presence on the construction canteen to issue clarifications and instructions.[21] By the fourteenth century, the architect-designer's elevated socio-economic status coupled with the rise of orthogonal drawings as a communication tool re-defined rules of engagement with the craftsman. This granted the architect-designer a degree of freedom to pursue simultaneous and geographically-dispersed projects, although, as historian Howard Burns shows, there was rarely

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[19] For an extended discussion of this topic, see Richard Coyne, *Technoromanticism: Digital Narrative, Holism, and the Romance of the Real* (Cambridge, MA and London: The MIT Press 1999).

[20] Sharon Helmer Poggenpohl, "Practicing Collaboration in Design," *Visible Language*, vol. 38, no. 2 (2004), 140.

[21] Leopold D. Ettlinger, "The Emergence of the Italian Architect during the Fifteenth Century," in Spiro Kostof, ed., *The Architect: Chapters in the History of the Profession* (Berkeley: University of California Press, 2000 [1976]), 109.

the expectation of completion or certainty that the architect-designer's contributions would survive his own demise.[22]

Literature Review: Architecture as a Profession

In the twenty-first century, project completion within one's lifetime is the normative expectation and the spatio-temporal gap between design studio and construction site is considerably greater than the past, attributable to communication technologies and constructional methodologies that enable a decoupling of conception and production -- Dana Cuff's "divisive practices" -- amidst the globalization of architectural practice.[23] Yet, in tracking these substantial changes in practice and concomitant relationships between architects and non-architect 'others' operating in the built environment, scholars of the profession historically disregard the problematical nature of collaboration. In his seminal 1927 text on the profession, Martin S. Briggs pays little heed to collaboration, proffering instead a view of architectural practice as an individualistic effort and an unabashed deification of the architect who from birth possesses "ideals and ambitions beyond mere construction and far beyond the mere earning of a livelihood."[24] Three decades later, Barrington Kaye endeavors to correlate stylistic transitions with milestones in education, status, and practice in the British architectural profession, while tracing the occupational divergence of architect/builder and continued reliance of the architect on patronage. Frank Jenkins, in another text published soon after Kaye's, acknowledges the interdependencies of architect, patron, and builder as a "building trinity" but, aside from the relative novelty of architectural practice as the object of study, the principal commonality with the earlier Briggs and Kaye texts is the silence on collaboration as an architectural term.[25]

Michael Middleton breaks this pattern in his examination of group practices in the design industries. He embraces the "wide acceptance" in the 1960s of "the necessity of inter-professional collaboration," while lamenting practitioner hesitation to translate this abstraction

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[22] Howard Burns, "Building Against Time: Renaissance Strategies to Secure Large Churches Against Changes to their Design," *L'Eglise dans l'Architecture de la Renaissance,* De Architectura series, ed. J. Guillaume, Paris (1996) 107-132. Along these lines, see also Jacques Le Goff, trans. Arthur Goldhammer, *Time, Work and Culture in the Middle Ages* (Chicago: University of Chicago Press, 1980) for a discussion of the distinction between the merchant's "professional time," founded upon practical considerations of economic gain, and the theologically-infused time of the Church. Le Goff cites the polarity of secular clock and church bell towers as expressive of the "great revolution of the communal movement in the time domain." (36) He notes the transition of Florentine painting from the traditional depiction of spiritually-inspired abstractions imbued with symbolic meaning to the immortalization of specific individuals in a "concrete spatial and temporal setting." This suggests that the obsession of Renaissance architects and patrons with preservation of design integrity and personal contribution was fueled less by humanist or politico-economic motives than by a concern for recording one's existence in the perceived permanence of brick and stone. Despite the ample evidence of classical ruins, architecture appears to have represented a measure of time that challenged theological time and far exceeded the fragility and impermanence of human life.

[23] Dana Cuff, "Divisive Tactics: Design-Production Practices in Architecture," *JAE*, vol. 45, no. 4 (July 1992), 204–212. See also Paolo Tombesi, "A True South for Design? The New International Division of Labour in Architecture," *ARQ*, vol. 5, no. 2 (2001), 171-180.

[24] Martin S. Briggs, *The Architect in History* (Oxford: The Clarendon Press, 1927), 382.

[25] Barrington Kaye, *The Development of the Architectural Profession in Britain: A Sociological Study* (London: George Allen & Unwin, Ltd., 1960); and Frank Jenkins, *Architect and Patron: A Survey of Professional Relations and Practice in England from the Sixteenth Century to the Present Day* (London: Oxford University Press, 1961).

into action.[26] His discussion of the "built environment" -- tucked amidst chapters on communication, product design, interior design, and entertainment -- couples historical justifications with promotional arguments for enhanced efficiencies and outcomes achievable through collaboration. In this regard, Middleton's text is a manifesto of sorts, characterized more by an enthusiasm for collaboration as a practice than any interest in critiquing its historical significance to the architectural profession.

An edited collection by Spiro Kostof the following decade amidst tendencies toward and tension surrounding the inclusion of non-architectural disciplines into the training and practice of architecture was, from Kostof's perspective, the first serious effort since Briggs to "survey . . . the fascinating career of what has often been thought of as the Mistress Art and its practitioners." For a "genuinely collaborative work," Kostof gathered a number of contributors including Joan Draper, Gwendolyn Wright, and Joseph Esherick to craft a broad survey of architect/patron and other relations from the medieval era onward containing scattered references to collaboration without specificity of meaning.[27] Most notable is an essay by Bernard Michael Boyle tracking the increasing "collaborative" nature of architectural practice from 1865 to 1965 that mirrored a palpable transition in the profession from generalization to specialization.[28]

The Kostof text initiated a wave of scholarly attention to the profession from diverse historical and sociological perspectives. Andrew Saint's episodic account of the variable architect persona (1983), Judith Blau's calculated assessment of discrepancies between expectations and realities of practice (1984), Gutman's dissection of architecture as a profit-oriented venture, and Dana Cuff's (1991) clinical observations of architecture as "cultural space" and architectural production as a social process all offer valuable insight into the tenuous position architects hold in society, and the reliance upon and variable tensions with the patron and a host of other professionals.[29] In this canon of scholarship, though, including a later text by Mary Woods pushing back the nascent years of the profession in America to the early decades of

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[26] Michael Middleton, *Group Practice in Design* (New York: George Braziller, Inc, 1969 [1967]), 93. Poggenpohl summarizes the text by highlighting Middleton's attention to "people under one professional umbrella -- doctors, lawyers, or designers -- working together for efficiency and scale to achieve an increase in service to the client and to enhance creativity and quality. Case studies of architecture, interior design, product design, communication design and entertainment (broadcasting) complement the general discussion. Well-known architecture firms, Skidmore Owings and Merrill in Chicago and The Architects Collaborative in Boston, for example, as well as the Industrial Design partnership, later called the Design Research Unit in Britain, ground the discussion in a practical way." (Poggenpohl, 140).

[27] Kostof, xix-xx. Mention should be made here of James Ackerman, whose writings on the Gothic pre-dating Kaye, Jenkins, Middleton, and Kostof are notable for departing from a conventional tectonic emphasis to scrutinize extant medieval documentation for the intentions of the architect and builder. This is a recurring theme in Ackerman's work, evidencing some roots in Paul Frankl's earlier efforts to move beyond formal study of the individual object to consider the motivations of architect and patron alike. Yet, in an account of the cathedral at Milan -- in which he attributes stylistic inconsistencies to a series of architects engaged over a prolonged period -- and in his seminal article on the nascent professionalization of architecture during the Renaissance, not once does Ackerman use the words collaboration or cooperation to depict relations between architects and other building participants (James Ackerman," '*Ars Sine Scientia Nihil Est*': Gothic Theory of Architecture at the Cathedral of Milan," and "Architectural Practice in the Italian Renaissance," in James Ackerman, *Distance Points: Essays in Theory and Renaissance Art and Architecture* (Cambridge, MA and London: The MIT Press, 1994), 211-268 and 361-384).

[28] Bernard Michael Boyle, "Architectural Practice in America, 1865-1965: Ideal and Reality," in Kostof, 309-344.

[29] Andrew Saint, *The Image of the Architect* (New Haven: Yale University Press, 1983); Robert Gutman, *Architectural Practice: A Critical View* (Princeton: Princeton Architectural Press, 1988); Judith Blau, *Architects and Firms: A Sociological Perspective on Architectural Practice* (Cambridge: The MIT Press, 1984); and Dana Cuff, *Architecture: The Story of Practice* (Cambridge: The MIT Press, 1991).

the nineteenth century, collaboration appears indiscriminately in an otherwise admirable project to dispel lingering notions of the architect as sole creative genius and to assert the collective character of architectural production.[30] Beatriz Colomina acknowledges this scholarly tendency away from "the architect as a single figure, and the building as an object" and toward "architecture as collaboration," but in a rush to foreground previously marginalized contributions by non-architect 'others' in architectural production and, by equating collaboration with the full spectrum of participatory modes in the production and representation of architecture -- lover, business partner, client, engineer, builder, photographer, critic, and curator -- she furthers the notion of an unbounded meaning to collaboration without reconciling its past.[31] Andrew Saint similarly speaks to the collective nature of architectural production in his more recent text on the divergences and convergences of the architectural and engineering professions, but in this otherwise comprehensive and insightful study of "sibling rivalry," Saint relies principally on collaboration as a generic relational term without clarity, or as synonymous with other collective action terms such as "reconciliation" and "unity" evoking vaguely positive connotations. [32]

Literature Review: Literary Arts, Authorship, and the Professions

This dearth of attention to the problematic nature of collaboration for the architectural profession prompts consideration of other disciplines for scholarly precedents. It is in the literary arts, where there exists extensive theorization and analysis of collaboration, and in the

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[30] Mary N. Woods, *From Craft to Profession: The Practice of Architecture in Nineteenth-Century America* (Berkeley and Los Angeles: University of California Press, 1999).

[31] Beatriz Colomina, "Collaborations: The Private Life of Modern Architecture," *JSAH*, vol. 58, no. 3, September 1999, 462. Despite this scholarly tendency, there remains a fixation with the solitary architect in contemporary practice, evidenced by journalistic attention to star architects and, as Anna Holtzman notes in her interview with Denise Scott Brown and Robert Venturi, the awarding of the annual Pritzker Prize to individual architects (Anna Holtzman, "So I Married an Architect," *Architec*t, vol. 93, no. 12 (December 2004), 66).

[32] Andrew Saint, *Architect and Engineer: A Study in Sibling Rivalry* (New Haven and London: Yale University Press, 2007), 489. An exception is a brief discussion of "a new kind of collaboration" between Ove Arup and Berthold Lubetkin in the lead-up to formation of Ove Arup and Partners (Saint, 366-370). For more on the architect/engineer relationship, see Antoine Picon, trans. Martin Thom, *French Architects and Engineers in the Age of Enlightenment* (Cambridge: Cambridge University Press, 1992); Ulrich Pfammatter, *The Making of the Modern Architect and Engineer: The Origins and Development of a Scientific and Industrially Oriented Education* (Basel, Boston, and Berlin: Birkhäuser, 2000); and *Bridging the Gap: Re-Thinking the Relationship of Architect and Engineer* (New York: Van Nostrand Reinhold, 1991).

scholarship on the modern professions, with an attention to collective identities and relational processes, that we find questions to be posed for architecture.[33]

In the first body of literature, the literary arts, themes of collaboration gravitate for the most part in two directions: first, toward theorizations of authorship and critique, and secondly, the analysis of collaborative practices. Both exist amidst a persistent notion of the solitary individual as generator of text.[34] This persistent romanticized notion of the individual creator is antithetical, according to author M. Thomas Inge and seconded by scholar Heather Hirschfeld, to widespread acceptance of the Foucault- and Barthes-inspired paradigm of text -- indeed all narrative form – as the manifestation of tensions between the author and the socio-political realities in which he/she operates. Moreover, as both Inge and Hirschfeld assert, there is a perception that not only is individual creativity dependent upon context, text is the end product of a collective process that commences with the author, extends through production and distribution, and concludes with consumption of the text by the reader.[35]

It is within this context of collectivity that collaboration arises in the literary arts. As a tool for critique, collaboration has historical roots in the New Bibliography movement of the early twentieth century.[36] The movement, pioneered by A. W. Pollard, R. B. McKerrow, and W. W. Greg, applies scientific-based methodologies to the discovery of multiple authorship in extant work where single authorship had been previously presumed. While many of New Bibliography hypotheses about individual texts have since been challenged and overturned, the often co-mingled topics of multiple authorship and literary collaboration serve as a basis, according to Hirschfeld, for considering theoretical issues of authorship and as a portal for exploring broader cultural implications of literary works. Hirschfeld observes that new definitions of collaboration inevitably arise as scholars place increasing emphasis on socio-political influences at the collective level, that is, on practice and "agency at the level of the group" and the interaction amongst members of the publishing community rather than on the individual author as a social

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[33] Literature on the sciences, where substantive structural and systemic transformations since the mid-twentieth century have given rise to collaboration as the predominant mode of knowledge production, tends more toward empirical, structural, and procedural concerns. Authorship See, for instance, Diana M. Hicks and J. Sylvan Katz, "Where is Science Going?" *Science, Technology, & Human Values*, vol. 21, no. 4 (Autumn 1996), 379-406; Wesley Shrum, Ivan Chompalov, and Joel Genuth, "Trust, Conflict and Performance in Scientific Collaborations," *Social Studies of Science*, vol. 31, no. 5 (October 2001), 681-730; Grit Laudel, "Collaboration, Creativity, and Rewards: Why and How Scientists Collaborate," *International Journal of Technology Management*, vol. 22, nos. 7/8 (2001), 762-781; and M. E. J. Newman, "The Structure of Scientific Collaborative Networks," *Proceedings of the National Academy of the United States of America*, vol. 98, no. 2 (January 2001), 404-409. As an exception, see Edward Hackett's theorizations of collaboration in the sciences more consistent with scholarship in the literary arts in Edward J. Hackett, "Essential Tensions, Control, and Risk in Research," *Social Studies of Science*, vol. 35, no. 5 Scientific Collaboration (October 2005), 787-826. For broader science and technology studies (STS), see, for instance, Thomas F. Gieryn, *Cultural Boundaries of Science: Credibility in the Line*, Chicago and London: The University of Chicago Press (1999), 51-62; Bruno Latour, *Pandora's Hope: Essays on the Reality of Science Studies*, Cambridge, MA and London: Harvard University Press (1999); Peter Galison, *Einstein's Clocks, Poincare's Maps*: *Empires of Time*, New York and London: W. W. Norton (2003); and John Ziman, *Prometheus Bound: Science in a Dynamic Steady State* (Cambridge: Cambridge University Press, 1994).

[34] M. Thomas Inge, "Collaboration and Concepts of Authorship," *PMLA*, vol. 116, no. 3 (May 2001), 624.

[35] Heather Hirschfeld, "Early Modern Collaboration and Theories of Authorship," *PMLA*, vol. 116, no. 3 (May 2001), 610.

[36] Ibid., 610-611.

construct.[37] For instance, Timothy Raylor's inquiry into the influence of socialization on authorial output through literary groups, poetry competitions, and casual drinking -- a topic to be examined in an architectural context in the second chapter of this study -- highlights collective action and, by considering various forms of human interaction, suggests new loosely structured or un-structured models of collaboration.[38] Similarly, as Hirschfeld notes, when Wendy Wall and Alexandra Halasz scrutinize the influence of the "collaborative" publication process on text during the Renaissance, they expand the meaning of collaboration and "simultaneously and consciously enlarge the definition of the author to printers, publishers, and booksellers."[39]

While acknowledging the contribution such readings make toward understanding the history of authorship by collaboration, Hirschfeld cautions against unmitigated use of the term in literary critique. One must be clear, she insists, on the precise structure and nature of collaboration as the word no longer holds universal meaning, referring as it does now to a range of structured and unstructured human interactions. She argues that if collaboration is to signify without limits the collective character of literary production, there should be a new term to clearly distinguish it from the conscious 'shared writing' of text by two or more individuals.[40] By contrast, Inge suggests that "any attempt by two or more individuals to create or compose something together . . . qualifies as collaboration, but I would argue for a broader understanding. Anytime another hand enters into an effort, a kind of collaboration occurs."[41] Yet Inge's proposal is open-ended; it theorizes an unbounded condition in which the presence of "another hand" promptly emblazons the mark of collaboration on the relationship or interaction. If such an unbounded definition of collaboration exists in architecture -- a relevant question given historical trends toward specialization and contemporary tendencies toward the unbundling of services -- who is the author of the work? What are the implications for authority of the process of architectural production? What impact might this have on the identity of the architect? If, on the other hand, collaboration is not unbounded, where are the delineations to be drawn and by whom? What are the implications for such an exclusionary phenomenon in architectural practice?

As to collaboration as a technique of practice, there is evidence of resistance in the literary arts attributable to academic practices that make it unattractive as a mode of knowledge production, further compounded by implicit and explicit rules against collaborative dissertations and the devaluing of multiple-author texts in considerations of faculty advancement. Lisa Ede and Andrea Lunsford -- who write of collaboration as a means of questioning assumptions on the presumed death of authorship in the face of "the relentless intertextuality of Web culture" -- see a

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[37] Ibid. To exemplify the individual author as social construct, Hirschfeld cites *Renaissance Self-fashioning: More to Shakespeare* (Chicago: University of Chicago Press, 1981), in which Stephen Greenblatt concludes that Renaissance authors "fashioned" themselves and their literary work to reflect the socio-political and religious tenor of their times.

[38] Timothy Raylor, *Cavaliers, Clubs and Literary Culture* (Newark: University of Delaware Press, 1994), as cited in Hirschfeld, 613.

[39] Wendy Wall, *The Imprint of Gender: Authorship and Publication in the English Renaissance* (Ithaca: Cornell University Press, 1993); and Alexandra Halasz, *The Marketplace of Print: Pamphlets and the Public Sphere in Early Modern England, Cambridge Studies in Renaissance Literature and Culture 14* (Cambridge, Cambridge University Press, 1997), both as cited in Hirschfeld, 614.

[40] Ibid., 619.

[41] Inge, 629.

dichotomous response to collaboration in the literary arts.[42] While on the one hand, their academic colleagues share an interest in collaboration as a technique to critique "subjectivity, agency, and authorship," they see little enthusiasm amongst these same scholars for collaboration as an alternative technique of practice.[43] They predict that the increasing complexity and interdisciplinary character of research in the humanities -- much as it is in the sciences -- will push scholars into collaborative engagements, yet the challenges of organizational structure, consensus, attribution, funding, and conflict will be new and unfamiliar ground for many of them.[44] That these scholars freely employ collaboration as a device for critique yet remain hesitant to engage it as a technique of practice raises a relevant question for this dissertation. To what extent is there a comparable paradox in architecture, that is, architects are open conceptually to the collective nature of architectural production but reluctant to venture into the still unfamiliar arena of multiple authorship?[45]

Finally, as Hirschfeld observes, the seemingly mystical and irresistible aura of collaboration "and perhaps the inevitable danger of this appeal" is evident in the widespread use of the word collaboration to describe the broad processes of literary production and consumption. "Collaboration and collaborative authorship are the terms now used to designate a range of interactions, from the efforts of two writers working closely together to the activities of printers, patrons, and readers in shaping the meaning and significance of a text."[46] Hirschfeld cogently captures a semantic confusion in the literary arts that is equally present in the design, production, and critique of the built environment. If there is no distinction between collaboration as encompassing the full range of participatory modes in architectural production, and collaboration as the 'shared' authorship of two or more individuals consciously working together, is there sufficient clarity of meaning to interpret the past, discuss the present, and make plans for the future?

Of equal importance to this study is the vast body of sociological and historical literature on the professions, which foregrounds the dynamics and complexities of work across disciplinary boundaries. This literature stems in great measure from a 1933 study in which A. M. Carr-Saunders and P. A. Wilson define a profession as a collection of individuals with shared specialized knowledge applicable to a specific range of situations.[47] In this theorization of the professional 'ideal,' processes of formalized education and examination control entry into a profession, and continued membership subject to compliance with a set of ethical and practice standards established by that profession.[48] Their research methodology, which prevailed as the standard for subsequent scholarly study of professions until the early 1960s, traces the history of English occupations they consider as professions, assesses the status of those occupations, and

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[42] Lisa Ede and Andrea A. Lunsford. "Collaboration and Concepts of Authorship," *PMLA*, vol. 116, no. 2 (March 2001), 354.

[43] Ibid., 356.

[44] Ibid., 363.

[45] Susanna Ashton's examination of the challenges and tensions in literary collaborations similarly provides a valuable basis for transposing these questions into an architectural context, in Susanna Ashton, *Collaborators in Literary America, 1870-1920* (New York: Palgrave MacMillan, 2003).

[46] Hirschfeld, 610.

[47] A. M. Carr-Saunders and P. A. Wilson, *The Professions* (Oxford, Clarendon Press, 1933).

[48] For an historical and etymological survey of 'profession,' see Bruce A. Kimball, *The 'True Professional Ideal' in America* (Lanham, MD: Bowman & Littlefield Publishers, Inc., 1995).

then weighs the results of the assessments against their own pre-conceived and idealized model of a profession uniquely prepared to combat a specialized segment of societal ills.[49] Within this same functionalist tradition, Talcott Parsons promotes the societal role for professions yet questions an apparent dichotomy between sociological theories on the altruistic character of professions and economic theories suggesting self-interest as the primary motivating factor in occupational behavior.[50] These functionalist scholars -- including Everett Hughes, whose essays include key themes pertaining to professionalization -- share a belief in an 'asymmetry of knowledge' in the professions, in which mutual trust between the professional-expert and client exist within a protective framework of professional ethics and regulations.[51]

With the pervasive societal upheavals of the 1960s, traditional institutions long accustomed to serving as "intermediaries" between the individual and government were now themselves targets in a "crisis of authority."[52] Within this ideological transformation, as Andrew Abbott summarizes, there is a marked shift in scholarly writing from the professional "ideal" toward consideration of authority and conflict in characterizations of the professions.[53] Eliot Freidson scrutinizes the medical profession and its functional reliance on privilege and control, while Jeffrey Berlant tracks its monopolistic tendencies.[54] Consider, for instance, Eliot Freidson's observation that professional legitimization and authority emanate from the manipulation and "transformation of knowledge by those who employ it."[55]
Magali Sarfatti Larson positions professions from a decidedly Marxist context of class structure in a broad sociological exploration of the legal, economic, and ethical implications. of professionalism -- a process of translating "special knowledge and skills" through the monopolization of expertise and status into "social and economic rewards."[56] In this context, she argues, architecture is unsuccessful as a profession for an inability to define and monopolize its own market.

More recent studies of the professions might be broadly categorized into several general lines of inquiry. The first is a comparative approach using the medical profession as a model for

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[49] Andrew Abbott, T*he System of Professions: An Essay on the Division of Labor* (Chicago and London: The University of Chicago Press, 1988), 4. The categorizations of scholarship on the professions employed here are based on Abbott and Kimball.

[50] Talcott Parsons, "The Professions and Social Structure," *Essays in Sociological Theory Pure and Applied* (Glencoe, IL: The Free Press, 1949), 185, originally published in *Social Forces*, vol. 17 (1939), 457-67; Abbott, 4; and Kimball, 312.

[51] Everett C. Hughes, "Professions," *Daedalus*, vol. 92, no. 4 (Fall 1963), 655-668; and Kimball, 319. The phrase 'asymmetry of knowledge' often appears in contrast with Rittel's "symmetry of ignorance" in studies of the professions. (Horst W. J. Rittel, "Second-Generation Design Methods," in Nigel Cross, ed., *Developments in Design Methodology,* London: John Wiley & Sons (1984), 317-327).

[52] David Steigerwald, *The Sixties and the End of Modern America* (New York: St. Martin's Press, 1995), 243.

[53] Abbott, 5.

[54] Ibid., and Eliot Freidson, *Professionalism Reborn: Theory, Prophecy, and Policy* (Chicago: University of Chicago Press, 1994).

[55] Eliot Freidson, *Professional Powers: A Study of the Institutionalization of Formal Knowledge* (Chicago: University of Chicago Press, 1988), xi.

[56] Magali Sarfatti Larson, *The Rise of Professionalism: A Sociological Analysis* (Berkeley: University of California Press, 1977), xvii. Larson's later study of post-modernism was a platform to critique the dynamic relations between architects and the economic/political power structures in which they operate (Magali Sarfatti Larson, *Behind the Postmodern Façade: Architectural Change in Late Twentieth-Century America* (Berkeley: University of California Press, 1993).

consideration of other professions while articulating disciplinary distinctions frequently overlooked in the universalizing tendencies of previous scholarship. A second category of scholarship -- for instance, *Society and the Professions in Italy 1860-1914* by Maria Malatesta and *The German Experience of Professionalization* by Charles McClelland -- accentuates geographical differences in professions and professionalism, especially between Anglo-American professions and their European counterparts that evolve from or remain engaged with the state.[57] This, in turn, leads to further interrogation of the relationship between the state and professions, as in Freidson's *Professionalism: The Third Logic* in which he suggests that, amidst current patterns of globalization, the state as guarantor of professional rights may be replaced by trans-national entities such as the European Union and World Trade Organization.[58] Steven Brint, in his study on the "splintering of the professional stratum along functional, organizational, and market lines" rather than along class lines, notes another category of inquiry, that of "new class" theory enveloping diverse concerns with "a new kind of class conflict in which 'knowledge-based' professional elites engage in a half-hidden, half-open conflict with 'profit-oriented' business owners and executives for power and status." For this group of conservative and liberal commentators, the conflict between "intellectually oriented professionals" and "business owners and executives" replaces the Marxist fascination with the conflict between capital and labor.[59]

Objectives, Methodological Strategy, and Chapter Synopses

Of relevance here is that embedded in these two bodies of scholarship -- the literary arts and the professions -- is the metaphorical use of boundaries, derived from Émile Durkheim's attention to classification systems and Max Weber's concern about inequality. This extends to Bourdieu's notions of *habitus*, identity, ethnicity, race, and gender, and to Michele Lamont's distinction between "symbolic" and "social" boundaries in "creating, maintaining, contesting, or even dissolving institutionalized social differences."[60] In Abbott's theorization of the professions, these boundaries remain in a state of fluidity due to ongoing competition for exclusive jurisdiction over bodies of knowledge and services in response to variable socio-economic forces.[61] At these fluid disciplinary boundaries, there are diverse relational processes and behavioral practices such as collaboration that are equally shifting and subject to external

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[57] Maria Malatesta, ed. *Society and the Professions in Italy, 1860-1914*, Cambridge Studies in Italian History and Culture, (Cambridge: University Press, 2002); and Charles McClelland, *The German Experience of Professionalization: Modern Learned Professions and their Organizations from the Early Nineteenth Century to the Hitler Era* (Cambridge: University Press, 2002).

[58] Eliot Freidson, *Professionalism: The Third Logic*, *On the Practice of Knowledge* (University of Chicago Press, 2001), 128.

[59] Steven Brint, *In an Age of Experts: The Changing Role of Professional in Politics and Public Life* (Princeton: Princeton University Press, 1994), 4-5, and 18. Brint includes Kevin Phillips and Irving Kristol on one side, and Barbara Ehrenreich and Daniel Patrick Moynihan on the other.

[60] Michèle Lamont and Virág Molnár, "The Study of Boundaries in the Social Sciences," *Annual Review of Sociology*, vol. 28 (2002), 168.

[61] Abbott abstracts three conditions of conflict reflecting this fluidity: excess jurisdiction, when the amount of work available within a jurisdiction exceeds that which the practitioners of a profession can manage, thereby inviting "invasion" from other professions; insufficient jurisdiction, when a shortage of work within a professional jurisdiction leads practitioners to "invade" the jurisdiction of others in search of new opportunities; and price-cutting, when two professions offer ostensibly equivalent services at different price points. Each of these conditions prompt fluidity in the delineation of jurisdictional spaces, leading to ongoing tensions as professions compete for dominance (Abbott, 250-251).

and internal pressures. Indeed, much as with Ernst Gombrich's interest in moments of rupture as most expressive of culture or Paul Rabinow's attention to "irruptive events" as markers of substantive societal change, the relational processes and tensions at these boundaries -- where multiple, fluid, and conflicting paradigms of theory and practice come into sharp view -- can be most illuminating about the core values and insecurities of a profession.[62] This raises for some scholars certain procedural and theoretical issues pertaining to optimizing communication, consensus, and decision-making across boundaries. Explorations, for instance, of "boundary-work" by Thomas Gieryn, "boundary objects" by Susan Leigh Star and James R. Griesemer, "boundary spanners" by Paul Williams, and of "trading zones" by Peter Galison for vast collaborative enterprises involving thousands of individuals, all exemplify ways of re-imagining these often complex relational processes.[63]

By coupling these relational processes at disciplinary boundaries with issues of identity, authority, and authorship raised in the literary arts, I establish a foundation for scrutinizing the collaborative divide in architecture. More to the point, my objective is to examine: motivations fueling the recurring architectural idealization of collaboration; its engagement by architects in crafting their own identity, authority, and authorship; the mechanisms of professional and state authority employed in its promotion and dissemination; and the variable socio-economic and political forces that preclude realization of its transformative promise in practice. To be clear, this is neither a project to elucidate all conceivable models of collaboration nor to unearth previously unknown instances of collective action.[64] It is as well not a "how-to" project on the pragmatics of collaboration, that is, a documentation of methodologies for optimizing communication and decision-making across disciplinary boundaries. Rather, the emphasis is on protagonists whose contributions to the American architectural discourse on collaboration are

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[62] Ernst H. Gombrich, *In Search of Cultural History* (Oxford: Clarendon Press, 1969); and Paul Rabinow, *French Moderns: Norms and Forms of the Social Environment* (Cambridge and London: The MIT Press, 1989), 15.

[63] Thomas F. Gieryn, "Boundary-Work and the Demarcation of Science from Non-Science: Strains and Interests in Professional Ideologies of Scientists," *American Sociological Review*, vol. 48, no. 6 (December 1983), 781-795; Susan Leigh Star and James R. Griesemer, "Institutional Ecology, 'Translations' and Boundary Objects: Amateurs and Professionals in Berkeley's Museum of Vertebrate Zoology, 1907-1939," *Social Studies of Science*, vol. 19, no. 3 (August 1989), 387-420; Paul Williams, "The Competent Boundary Spanner," *Public Administration*, vol. 80, no. 1 (2002), 103-124; and Peter Galison, *Image & Logic: A Material Culture of Microphysics* (Chicago and London: The University of Chicago Press, 1997), 781-844. Lamont and Molnar forecast that "focusing on boundaries may generate new theoretical insights about a whole range of general social processes present across a wide variety of apparently unrelated phenomena -- processes such as boundary-work, boundary crossing, boundaries shifting, and the territorialization, politicization, relocation, and institutionalization of boundaries (Lamont, 168.)

[64] The protagonists in the case studies to follow are nonetheless not as deeply associated with twentieth-century collective action in the professional and scholarly consciousness as much as, for instance, Gropius and the Bauhaus in the early decades of the twentieth century, or perhaps Peter Cook and Archigram operating much later in the 1960s. There is no question that Gropius' attention to collective action continues to be the object of fascination for many scholars, but his semantic affinity for 'teamwork' over 'collaboration' places him as a highly relevant rather than broadly representative figure in this discussion. Groups such as Archigram, on the other hand, while operating amidst a wave of collective activity in post-1960s art and architecture, were far more focused on alternative urban visions - habitable infrastructures that, through modularity and mobility, respond swiftly to evolving societal needs - than on popularizing collaboration as a practice. On Archigram, see Simon Adler, *Archigram: Architecture without Architecture* (Cambridge, MA: The MIT Press, 2005); and Hadas Steiner, "The Architecture of the Well-Serviced Environment," *arq*, vol. 9, no. 2 (2005), 133-143. On the 1960s collaborative art scene, see Charles Green, *The Third Hand: Collaboration in Art from Conceptualism to Postmodernism* (Minneapolis: University of Minnesota Press, 2001). As with Ashton (2003) on literary collaboration, Green's study also serves as a model for this dissertation, as he employs case studies to trace three models of artistic collaboration in the 1960s that challenged prevailing artistic boundaries.

most representative of specific moments in the twentieth-century. For it is in their written and spoken words, following Forty, that we find both the idealization and the problematics of collaboration.[65] In this regard, the dissertation is an historical investigation following the lead of Kostof, Saint, and Woods: the profession rather than physicality of architecture as object of study; a reliance upon primary archival sources such as lectures, notes, correspondence, collected materials, published work, and institutional records; and an historical narrative contextualized by socio-economic and political forces. Moreover, in positing the profession as a cultural practice, I engage the sociological approach rooted in the work of Gutman, Blau, and Cuff whereby cultural analysis reveals patterns in everyday practices. The patterns I seek in this instance pertain to why architects invest transformative aspirations in collaboration, how they seek to fulfill these aspirations, and in what manner these practices mirror and/or conflict with how architects wish to be perceived by non-architect 'others.'

The chronological period of this dissertation -- 1890 to 1970 -- is of particular relevance to this investigation as it is the nexus between formative nineteenth-century efforts to distinguish the architect from other building participants through the formalization of practice, and late twentieth-century efforts to integrate the architect into flexible interdisciplinary teams operating in a global marketplace. Although I present three case studies in roughly chronological order, there is no suggestion of a linear or teleological progression. Rather, the overlap of dates and protagonists in each chapter reflects the slow, imprecise passage of theory and practice embedded in the paradigmatic transitions of the period. This calls to mind Manfredo Tafuri's depiction of the utopianism/realism shift in the modernist trajectory occurring over an extended period during which "realistic utopianism and utopian realism overlap and complement one another."[66]

In Chapter One, I summarize the origins of the architectural discourse on collaboration, evidencing roots in the literary arts and the sciences before crossing through the visual arts in the late nineteenth century into the architectural realm. Multiple models of collective action emerge from this nascent discourse, each of which demonstrate early tensions with contemporaneous efforts in the same period to articulate architectural identity, authority, and authorship premised on the individual. For the first case study in Chapter Two, I pick up the discourse from the last decade of the nineteenth century through 1930, a period when architectural modernism arose slowly and concurrently with a prevailing historicist paradigm rooted in revivalist tendencies and the awakening of an American Renaissance.[67] American architects did not, however, universally embrace this paradigm shift and those most resistant to the new architecture pursued an agenda of collaboration -- idealized as the physical integration of architecture, painting, and sculpture -- in an effort to perpetuate the status quo. Despite its promotion as a panacea for industrialized urban chaos, this agenda of collaboration was less about boundary-crossing than the affirmation of boundaries between historicists and modernists, architects and artists, architects and engineers. Historicist architects were indeed eager to work closely with other professionals, but the erasure of disciplinary lines or surrender of leadership role was out of the question. Such moves

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[65] Forty, 15.

[66] Manfredo Tafuri, *Architecture and Utopia*, tr. Barbara Luigia La Penta (Cambridge, MA and London: The MIT Press, 1976), 46 and 48.

[67] While recognizing this continuum of stylistic positions, I make a distinction between historicism and modernism for the purpose of contrasting and comparing iterations of collaboration in the second and third chapters of this dissertation. For further discussion of the American Renaissance, see Richard Guy Wilson, "Architecture and the Reinterpretation of the Past in the American Renaissance," *Winterthur Portfolio*, vol. 18, no. 1 (Spring 1983), 69-87.

suggested diminution of professional status, a situation architects could ill-afford in the competition with engineers and builders -- as the scholarship by Kostof, Woods, and Saint all highlight -- for dominance in the built environment. Historicists instead promoted the architect as "commander-in-chief" of collaborations, a view more compatible with parallel efforts to depict the architect as the patron's trusted advisor while articulating a professional identity fashioned on the successes of H. H. Richardson, Richard Morris Hunt, and Daniel Burnham.[68]

To exemplify this agenda of collaboration and how civic and professional associations collectively empowered its dissemination and access to political authority for its boundary-making aspirations, I focus in this first chapter on the activities of C. Grant La Farge (1862-1938), an architect acclaimed by editors of *The Brickbuilder* for "high ideals, imaginative vision, and deep sense of responsibility."[69] For much of his career, La Farge held official positions with the American Institute of Architects, the Architectural League of New York, and the American Academy in Rome, where his father, the renowned artist John La Farge, and others aspired to cultivate a spirit of collaboration. These positions rendered La Farge a visible face of the architectural profession, a status he employed to the fullest with a vigorous defense of historicism and a decidedly historicist iteration of collaboration delineated around architects and artists. His stances on the profession -- architecture as the assemblage of the arts, collaboration as the physical integration of architecture and the allied arts, and the architect as leader of collaboration -- resonated with a network of colleagues nurtured in the posh venue of elite gentlemen's clubs who ostensibly held the professional and political authority to codify the historicist iteration of collaboration.

In Chapter Three, I consider a markedly different set of relations in the context of federal intervention into the economy from 1929 onward under the broad auspices of Roosevelt's New Deal programs. Whereas La Farge and his compatriots remained for the most part comfortably within the private sector, a major shift in federal political and economic direction led to the formation in 1933 of the Public Works Administration and subsequent direct federal participation in housing production. This, in turn, prompted architects to hastily assemble collective action groups to compete for commissions and employment available under these programs. The protagonists in this chapter, however, found little commonality on collective action. One, Robert D. Kohn, spoke compassionately of cooperation amongst the professions for societal good but resisted collaboration for its affiliation with historicism. The other, William Lescaze, explicitly argued for professional collaboration as essential to a modernist integration of art and architecture. Contributing to these polar positions was that the two protagonists operated from competing modernist paradigms. For Lescaze, a European modernism employing an entirely new architectural vocabulary premised on industrial precedent, efficiency, and societal good; for Kohn, an adaptive modernism grounded in the underlying theory of the École des Beaux-Arts applied to twentieth-century exigencies. Of greater importance, as we shall see, is that Kohn's call for an ethics-based re-examination of human and professional relations only incidentally relied upon architecture as a vehicle for change, while conceding primacy to social over physical outcomes of architectural production. Lescaze, on the other hand, did not reject an ethical basis to practice but saw in modernism a renewed opportunity for the physical integration of

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[68] Edwin Howland Blashfield, "Considerations on Mural Painting," *AABN*, vol. 103, no. 1937 (February 5, 1913), 85.

[69] "Brief Sketches of Contemporary Members of the Architectural Profession," *The Brickbuilder*, vol. 24, no. 10 (1915), 261.

architecture and art both reflective of and in service to contemporary social exigencies. Paradoxically, while Lescaze represents for many scholars the archetypal modernist European import -- the Philadelphia Saving Fund Society (PSFS) building is ubiquitous in accounts of American modernism prior to the Second World War -- he instinctively co-opted an earlier historicist model of architect/artist collaboration to a modernist context, whereas the École-trained Kohn looked beyond collaborative formulations of any stylistic ilk to a modern society structured on ethics-based cooperation.

These differences are all the more intriguing as Lescaze and Kohn operated in overlapping professional spheres in the 1930s, the principal period of interest in this third chapter. As a director of the Public Works Administration in 1933 and 1934, Kohn initiated federal intervention into housing production on a massive scale, including the seminal Williamsburg Houses project in New York City designed in part by Lescaze. This overlap of professional activity culminated in the 1939-40 New York World's Fair, a contentious contemplation on democratic society past and future that proved to be a formidable test of collaboration and cooperation on par with the World's Columbian Exposition in Chicago a half century earlier. With Kohn on the Board of Design and Lescaze as designer of two pavilions, competing views of collaboration and collaboration collided in the public realm, as did polemics over the efficacy of the modernist agenda for societal good.

In Chapter Four, the final case study, I take up collaboration as a stylistically-neutral process of design in the 1950 and 1960s, a view far removed from the historicist and modernist physical iterations of La Farge and Lescaze. It was a post-war milieu in which seemingly infinite possibilities for scientific knowledge bolstered an American democracy quite different from the ethics-based iteration imagined by Kohn. Inspired by a burgeoning global American presence fortified by techno-military accomplishments, corporate America embraced scientific methodologies and organizational theories to enhance productivity and grapple with the continuing emergence of specializations in the work force. Architects similarly pursued a systemization of the design process, one that idealized collaboration as an interdisciplinary technique to enhance the efficiency and outcome of architectural production. Serge Chermayeff, the principal protagonist of this chapter, argued, however, that despite such rationalization, architects remained fundamentally ill-prepared to address complex problems bearing multiple social, scientific, and artistic dimensions. To re-cast architects as contributing "functionaries" for the good of society -- for Chermayeff, a defining aspect of a profession -- he sought a complete transformation of practice, premised on eradication of the "obsolete" image of architect as artist in favor of the sciences as a model for practice. He championed a language of process over typology of form, collective anonymity over individualism and specialization, and a re-integration of the design professions previously separated in practice and academia as a single field of environmental design. Contrasting with the La Farge chapter in which collaboration is the physical outcome of a re-integration of the arts, and the Lescaze/Kohn chapter in which collaboration and cooperation are in open competition amidst broad politico-economic concerns, with Chermayeff collaboration becomes a means to an end, that of a unified field of action motivated by socio-environmental concerns and legitimized by adoption of a scientific model of practice.

This last case study, with its attention to collaboration as an integrative process linked to aspirations for a unified field of action, sets the stage for consideration in the concluding chapter of a twenty-first century architectural discourse embedded within a broader societal engagement with collaboration. This broader engagement, as I will show, is ubiquitous in the corporate

sector and in popular culture as an ostensibly innovative best-practice suggestive of egalitarian and transparent decision-making. It is held out as bearing beneficial capacities beyond that of other modes of collective action, paradoxically enabled by information and communication technologies in a milieu in which human relations are made more complex by these very same technologies. In architectural discourse, this idealization extends to notions of integrated practices across disciplinary boundaries. While the technology-collaboration nexus evident in this current discourse differs markedly from past discourses, the fundamental commonalities with earlier iterations of collaboration remain remarkably unchanged; namely, the presumption of a centralizing role for the architect in architectural production, and a faith in the curative powers of collaboration absent any structural or methodological transformations of practice. Complicating matters is that in the twenty-first century discourse, architects turn not to history for insight -- as noted earlier, the discipline of architecture lags in its attention to its history of collaboration -- but to the seemingly unmitigated currency granted to collaboration in the broader societal discourse.

In 1890, the critic Brander Matthews published an essay entitled "The Art and Mystery of Collaboration" in which he observes that when

> two men have worked together honestly and heartily in the inventing, the developing, the constructing, the writing, and the revising of a book or a play, it is often impossible for either partner to pick out his own share; certain things he may recognise as his own, and certain other things he may credit frankly to his ally; but the rest was the result of the collaboration itself, contributed by both parties together and not by either separately.[70]

Despite this confidence in the "third hand" of collaboration, Matthews hesitantly approaches the question of collaborative methodology, noting that his explanation is "at best a doubtful possibility."[71] Similarly, thirty years later in "The Art of Collaboration," critic Royal Cortissoz endeavors to comprehend its mystery, ultimately conceding "that collaboration somehow cannot be organized. It happens. It waits . . . for the chosen, the man with the mark of the gods upon him."[72] Matthews and Cortissoz were both studied observers and advocates of collaboration, yet they struggle in their respective articles to overcome the mystery of its realization. I seek in this dissertation to move beyond their efforts; to draw upon previous scholarly investigation of relational processes across disciplinary boundaries and upon issues of identity, authority, and authority in the literary arts to begin unraveling the problematics of collaboration for the architectural profession. More specifically, I seek to understand the historical significance of collaboration as a mode of collective action and socially-situated practice, its engagement with articulating the identity, authority, and authorship of the architect, its intimate involvement with structures of power, and the consequences when its realization

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[70] Brander Matthews, "The Art and Mystery of Collaboration," *Longman's Magazine*, vol. 16, no. 92 (June 1890), 157.

[71] Charles Green, *The Third Hand: Collaboration in Art from Conceptualism to Postmodernism*, (Minneapolis, University of Minnesota Press, 2001). Matthews writes: "This paper is, perhaps, rather a consideration of the principle of collaboration than an explanation of its methods. To point the departments of literature in which collaboration may be an advantage and to indicate its more apparent limitations have been my objects, and I have postponed as long as I could any attempt to explain 'how it is done.' Such an explanation is at best a doubtful possibility" (Matthews, 167).

[72] Royal Cortissoz, "The Art of Collaboration," *Architecture*, vol. 56, no. 4 (October 1927), 185.

departs from its theorization. This investigation relies on primary archival sources including lectures, notes, correspondence, collected materials, published work, and institutional records contextualized by socio-economic and political forces, with an emphasis on the written and oral contributions of the protagonists to the architectural discourse. The insights garnered from this investigation will contribute to an historically-based framework for assessing the contemporary re-emergence of collaboration as an idealized signifier of collective action and, more generally, demonstrate how theories of practice are realized or altered within the context of transformative agendas.

Chapter One
Collaboration:
Origins of the Architectural Discourse

Before delving into the three principal case studies, I briefly examine here the origins of the architectural discourse on collaboration, a word that, having entered the English language from the French at the opening of the nineteenth century, remained for some decades confined principally to a scientific or literary context.[73] Collaboration initially inferred a degree of co-scholarship or co-authorship beyond its pure etymological root of co-labor, but an absence of specificity or normative collaborative model left the word semantically fluid. As an example, in an 1818 competition announcement from the Utrecht-based Society of Arts and Sciences posing a challenge to the seminal "chymical nomenclature" of chemist Antoine Lavoisier and his "collaborators," it is unclear if these were Lavoisier's scientific peers or subordinates.[74] Similarly, the author of an 1821 review of the *Institutions of Gaius* -- cited as one of the "greatest literary curiosities of the day" -- explicitly equates collaboration with multiple authors, while an article on French journalism two decades later suggests synonymy between "collaboration" and "contribution."[75]

The advent of specialized journals in the mid-1800s -- a development enabled by advances in printing technology that extended intellectual discourse to "almost every field of thought, labor, and industry" in America -- facilitated the transference of collaboration from scientific and literary lexicons into other fields of endeavor.[76] In the architectural realm, *American Architect and Building News* (*AABN*) was the first to enjoy sustained financial support in this new publishing era, and its longevity -- from its founding as a weekly in 1876 until incorporation into *Architectural Record* in 1938 -- contributed to its influential role in the articulation of architecture as a profession.[77] As Mary Woods discusses, implicit in the attention to educational, practice, and technical matters in the journal was the delineation and promotion of the architect's identity and authority in contrast with other building occupations. As this discourse unfolded, the first appearance of collaboration on the pages of *AABN* in 1878 was not in an architectural context, rather in reference to a series of papers on "instruction, criticism, and gossip in matters of art," with the "collaboration of Mr. Sturgis, Mr. Prince, Mr. Tiffany, and Gen. di Cesnola."[78] More suggestive of a broader artistic application was an English-language translation two years later of a piece originally penned in French by M. Edouard Corrooyer, who

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[73] Note, for instance, the following remarks dating to 1820 concerning the *Medical Repository*, the first American medical journal, shortly before its demise in 1824 due to financial problems, declining readership, and rising competition. "We had hardly accomplished half our task, when our medical journal appeared insufficient to the increased number of professional readers; and worthy collaborators entered the same career with us in different parts of the Union, and with various success. Increased emulation in the rising generation could not fail to maintain the reputation, patronage, and usefulness of the Medical Repository, even after death had summoned two of its laborious editors." (*The Medical Repository of Original Essays and Intelligence, Relative to Physic, Surgery, Chemistry, and Natural History*, vol. 5, no. 1 (1820), 02).

[74] Anonymous, "Article XVI, Miscellanea," *The Journal of Science and the Arts*, 1817-1818 (1818), 130.

[75] "The Institutions of Gaius, The Version of Uphilas," *North American Review and Miscellaneous Journal* (1821), 394; and *Living Age*, vol. 10, no. 13 (11 July 1846), 72 and 76.

[76] Mary Woods, "The First American Journals: The Profession's Voice," *JSAH*, vol. 48, no. 2 (June 1989), 118.

[77] Ibid.

[78] *AABN*, vol. 4, no. 144 (28 September 28 1878), 107.

recalled his mentor Viollet-le-Duc as one of a number of architect "collaborators" sitting on a commission concerned with preservation of "prestige" monuments in France.[79]

As the market for *AABN* expanded in the 1880s and 1890s in concert with increasing formalization of the profession, an ever-larger audience of architects read of an artistic context to collaboration through the prolific writing of Mariana Griswold Van Rensselaer and Frederic Crowninshield. Following a path initiated in the 1870s by Montgomery Schuyler and Henry Van Brunt, Van Rensselaer and Crowninshield held out European art and architecture as examples by which to critique American cultural production and rouse practitioners to higher technical and stylistic standards.[80] By grounding her discussions in the past glories of Europe -- as with the Renaissance artist Luca working on the sacristy door at Florence Cathedral "in collaboration" with Michelozzo and Masaccio before completing the work himself -- Van Rensselaer contributed to the legitimization of collaboration as a timeless artistic notion.[81] In an 1881 review of a water-color exhibition sponsored by the Salmagundi Sketch Club, she observes that the work of Messrs. Lungren and Blum were "almost indistinguishable; they often work in collaboration on the same themes, and one doubts, almost, whether they themselves can always tell their works apart."[82] Another water-color exhibition two years later was opportunity to reiterate collaboration as a decidedly artistic technique, with Van Rensselaer observing that "Mr. Abbey and his English friend, Mr. Parsons, had painted in collaboration a landscape with figures that was one of the most valuable things in the collection."[83] Van Rensselaer suggests here a very specific iteration of collaboration, in which the physical outcome masks the multiple hands engaged in its preparation, contrasting with an alternative model in which two or more individuals might work together on sympathetic or compatible efforts. Similarly, Crowninshield -- an artist in his own right and contributor to the *Dictionary of Architecture and Building* -- spoke of this integrative character of collaboration, depicting it as an essential ingredient in the master/pupil relationship of the Renaissance when artists and architects were frequently as one.[84] As with Van Rensselaer up to this point, Crowninshield wrote exclusively of collaboration in an

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[79] Corrooyer also comments favorably on Viollet-Le-Duc's treatment of construction craftsmen, "whom he animated by his creative breath," as "collaborators." M. Edouard Corrooyer, "Viollet-Le-Duc," trans. from *Gazette des Beaux-Arts* (undated), as re-printed in *AABN*, vol 7, no. 210 (3 January 1880), 9.

[80] As Harriet Senie and Sally Webster discuss, fueling this paradigm was "the ultimate disappointment with the various Capitol decorations, including John Trumbull's paintings for the Rotunda and the Italian artist Constantino Brumidi's frescoes for its hallways and offices, that prompted leading critics, artists, and architects in the 1870s to look to European precedents for inspiration and guidance. It was evident to writers such as Henry Van Brunt and Montgomery Schuyler, the architect H. H. Richardson, and the painters John La Farge and William Morris Hunt that the crisis facing this country vis-à-vis pubic art and architecture reflected the technical and conceptual inexperience of American artists and architects. Travel and training in Europe and the publication of works by such authorities as John Ruskin and Eugene Viollet-le-Duc were translated into new American building projects such as Trinity Church, Boston, and the state capitol in Albany, New York, where color decoration and mural painting became important aspects of the interior design as well as carriers of religious and civic iconography." (Harriet Senie and Sally Webster, "Editor's Statement: Critical Issues in Public Art," *Art Journal*, vol. 48, no. 4 (Winter 1989), 287).

[81] M. G. Van Rensselaer, "The Della Robbias -- I," *AABN*, vol. 17, no. 481 (14 March 1885), 125.

[82] M. G. Van Rensselaer, "Recent Picture Sales and Exhibitions," *AABN*, vol. 9, no. 268 (12 February 1881), 79.

[83] M. G. Van Rensselaer, "The Water-Color Exhibition, New York," *AABN*, vol. 13, no. 378 (24 March 1883), 138.

[84] Frederic Crowninshield, "The Relation Between Painter and Architect," *AABN*, vol. 9, no. 270 (26 February 1881), 99; Frederic Crowninshield, "Mural Painting -- XII," *American Architect and Building News*, vol. 19, no. 554 (29 May 1886), 256, and "A Dictionary of Architecture and Building," *Congregationalist*, vol. 86, no. 11, 16 March 1901, 421. Other contributors to the Dictionary included Russell Sturgis, Edwin Blashfield. Ralph Adams Cram, Henry Van Brunt, and John La Farge.

artistic context but hinted at a possible architectural application when suggesting that contemporary architects and artists, long operating in divergent realms, might at least possess "a superficial knowledge of the sister profession." [85]

Seminal steps toward collaboration in a more explicit architectural context may be seen in an 1886 article by Van Rensselaer, in which she credits the harmonious beauty of decorative grillage achieved by "collaborators" Emanuel Héré and Jean Lamour at Place Stanislasis in Nancy, France to "that accord in idea and execution between artists in different branches from which alone can spring the finest architectural results." [86] Van Rensselaer specifically foregrounds here an interdisciplinary collaboration between architecture and its sister arts, pressing this iteration further in a review of an 1889 Architectural League exhibition, in which she comments favorably on a mausoleum with angelic caryatids executed by "Mr. St. Gaudens, in collaboration with the architect, Mr. Page Brown." [87] Alfred Melani followed suit two years later in an extended series on Italian architecture translated from the French, in which he describes a succession of architect-artists responsible for the Santa Maria del Fiore in Florence -- Arnolfo di Cambio, Giotto, Andrea Pisano, Francesco Talenti -- concluding that a work of such artistic significance would certainly be the result of "collaboration." [88] In subsequent articles, he elaborates on such sequential collaborative arrangements, noting that it was normative practice during the Renaissance owing to the prolonged construction of great monuments, as with the "collaborative construction" at St. Peters.[89]

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[85] Crowninshield, "The Relation Between Painter and Architect" (1881), 99. Notwithstanding these examples of collaboration in an artistic context, other commentators insisted that collaboration was not yet in the latter part of the nineteenth century a normative model for artistic activity. Frank Weitenkampf, long-time art department chair and print curator at the New York Public Library, observed in 1897 that instances of collaboration in art were not as common as in the literary realm, with the exception of "artist-marriages" and "family partnerships," or when the artistic endeavor is of a scale "as naturally to call for co-operative production, or to supply knowledge lacking on one side, or to utilize the talent of pupils in order to keep up with the rush of orders, or in answer to an idle whim, or on account of an evident union of ideas and sympathies." (Frank Weitenkampf, "Fine Arts," *The Independent*, vol. 49, no. 2550 (14 October 1897), 8). Art critic Royal Cortissoz similarly noted that the 1879 edition of Webster's dictionary defined collaborator as "an associate in labor, especially literary or scientific," prompting him to suggest that artistic collaboration was not a "familiar phenomenon" at the time of its publication. (Cortissoz, "The Art of Collaboration," (1927), 181. Finally, a column in an 1890 edition of *The Critic: A Weekly Review of Literature and Arts* documents that the "word 'collaborate' is not be found in Webster's International Dictionary, though 'collaborateur,' 'collaborator,' and 'collaboration' are." ("Notes," *The Critic: A Weekly Review of Literature and the Arts*, vol. 14, no. 359 (15 November 1890), 253.

[86] M. G. Van Rensselaer, "Art in Alsace and Lorraine -- III," *AABN*, vol. 20, no. 564 (16 October 1886), 181.

[87] Mrs. Schuyler Van Rensselaer, "Fine Arts: Exhibition of the Architectural League," *The Independent*, vol. 41, no. 2093, (10 January 1889), 7.

[88] Alfred Melani, "Italian Architecture -- IV," *AABN*, vol. 34, no. 832 (5 December 1891), 143.

[89] Alfred Melani, "Italian Architecture V," *AABN*, vol. 34, no. 833 (12 December 1891), 161; "Italian Architecture VII," *AABN*, vol. 34, no. 835 (December 26, 1891), 192; and "Italian Architecture IX," *AABN*, vol. 35, no. 837 (9 January 1892), 19. As to this normative practice, Howard Burns addresses time as a remorseless obstacle to the Renaissance architect who, working within the technological and constructional context of the era, would rarely expect to complete large-scale projects, or have any certainty of the continued integrity of his contribution to works of great magnitude and duration. Citing the prime example of Michelangelo's obsession with preserving his own contributions to St. Peter's in the wake of shifting design authority and stylistic re-direction from Bramante to Raphael and then again to Sangallo, Burns highlights a Renaissance perception of time as insurmountable, thus giving architects and patrons alike an incentive to manipulate the design and construction process to privilege their personal objectives over practical considerations in a bid to protect their contributions to the building endeavor (Burns, 107-132).

It is in the 1890s, the beginning of the period under study in this dissertation, and more specifically with the 1893 World's Columbian Exposition in Chicago, that there is the flowering of collaboration as an architectural term.[90] Studies abound of the profound impact of the Exposition on American architecture, as historicist-oriented practitioners rejected prevailing revivalist tendencies in favor of a Beaux Arts-inspired "American Renaissance," fueling tensions with a nascent modernism at a critical moment when advances in constructional technologies, socio-economic pressures, and urban densification demanded architectural innovation.[91] While these historicist/modernist tensions are central to the subsequent polemics over collaboration to be examined in this dissertation, of interest at the moment is that accounts of the Exposition sparked a proliferation in journalistic usage of collaboration in an architectural context, contributing significantly to its absorption into the collective architectural mentality. Even before the official opening of the Exposition in May 1893, contributors to general circulation magazines and newspapers such as the *Century*, *Scribner's*, *Atlantic Monthly*, *Cosmopolitan*, *Harper's*, the *New York Times*, and *New York Tribune* extolled its architecture and unprecedented collaborative production effort. Van Brunt, Schuyler, Van Rensselaer, and Russell Sturgis all wrote passionately of a "harmonious" and "noble" beauty to be seen at the Exposition that would most assuredly bear a positive "intellectual, spiritual, and moral" influence on American society, explicitly attributing these qualities to the "collaboration" of architects and artists under the direction of Daniel Burnham and, briefly before his death, his partner John Wellborn Root.[92] Embracing what she had once ascribed almost exclusively to artists, Van Rensselaer remarked on the "brotherly accord" amongst the lengthy roster of prominent architects working on the Exposition,

> by no means crushing out their artistic personalities, but basing the expression of individual tastes upon a broad fundamental agreement with regard to the placing, the general style, and the dimensions of the structures, and the scale of their major features.[93]

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[90] In an English-language article translated from the French and published two years prior to the Chicago Exposition, an author suggests that solutions for "healthful and economical dwellings" for Parisian workers would emanate from "the collaboration of architects, students of hygiene, of economy and of finance…who must be united in philanthropic endeavor to attain the desired end." "Paris," *AABN*, vol. 32, no. 797 (4 April 1891), 8-12.

[91] On this latter point, see the writings of Lewis Mumford in "The Chicago Fairs," *New Republic*, vol. 65 (12 January 1931); "The Sky Line: Houses and Fairs," *The New Yorker* (30 June 1936), as re-printed in Robert Wojtowicz, ed. *Sidewalk Critic: Lewis Mumford's Writings on New York* (New York: *Princeton Architectural Press*, 2000), 160; and "West is East," in Wojtowicz, *Sidewalk Critic*, 235-236; and Lewis Mumford, "The Architecture of the Interregnum" in Lewis Mumford, ed., *Roots of Contemporary American Architecture* (New York: Reinhold Publishing Corporation, 1952), 14-18.

[92] Marianna Griswold Van Rensselaer, "The Triumph of the Fair-Builders," *The Forum*, vol. 14 (December 1892), 527-540, as reprinted in Marianna Griswold Van Rensselaer, David Gebhard, ed., *Accents As Well As Broad Effects: Writings on Architecture, Landscape, and the Environment, 1876-1925*, (Berkeley: University of California Press, 1996), 79. Beyond the stylistic influence of the Chicago Exposition, this idealization of collaboration is notable as the architects involved (Daniel Burnham, Henry van Brunt, Richard Morris Hunt, McKim, Mead & White, etc.) were all under the influence of the École des Beaux-Arts, which, while promoting the integration of architecture and allied arts, evidenced a fierce competitiveness amongst students attributable to a pedagogical system that held out coveted government positions as the ultimate reward.

[93] Ibid., 72.

Van Brunt, moreover, designer with Frank Howe of the Electrical Building at the Exposition, depicted the collaboration of "men of the highest ability in every department of art" as a family.[94]

> Of this family Mr. Hunt was the natural head; two of its members, Post and Van Brunt, were his professional children; Howe, Peabody, and Stearns, having been pupils and assistants of the latter, may be considered the grandchildren of the household; while McKim, who had been brought up under the same academical influences, was, with his partners, of the same blood by right of adoption and practice. Collaboration under such circumstances, and under a species of parental discipline so inspiring, so vigorous, and so affectionate, should fail to confer upon the work resulting from it some portion of the delightful harmony which prevailed in their councils.[95]

This parent/child metaphor suggests a hierarchical structure to collaboration consistent with dual propositions, as David Brain notes, foregrounded by journalistic coverage of the Chicago Exposition: first, that of the architect as the "guiding intelligence" amongst diverse practitioners engaged with the built environment, and secondly, architecture as a vital tool of Progressive-era urban reform programs.[96]

In the decade following the Exposition, the architectural discourse transitioned from the earlier breathless exaltation of collaboration to a more studied exploration of its boundaries and models of practice. As editor of *The Architectural Annual* of 1901 -- a publication dedicated to capturing a long view of "changes of architectural sentiment" -- Albert Kelsey asserted the collective character of architectural production by depicting it is "an art in which collaboration of many hands is necessary."[97] These "many hands" included, for an *AABN* columnist, architects and surgeons engaged in an "intelligent collaboration" on an innovative surgical facility responsive to "needs created by scientific progress."[98] For a 1902 article on Francois Hennebique's innovative armored-concrete system, Leopold Mensch attributes the inventor's success to his association with "a great many engineers, architects, practical and scientific men who have imparted to him their ideas and become his collaborators."[99] Architect John M. Carrère similarly acknowledges a broad, if not unbounded, definition of collaboration when, in a 1904 discussion of desirable attributes for young men contemplating a career in architecture, he dismisses as anachronistic a notion of the solitary architect. The complexity of design and

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[94] H. C. Bunner, "The Making of the White City," *Scribner's Magazine*, vol. 12, no. 4 (October 1892), 418; and Henry Van Brunt, "The Columbian Exposition and American Civilization," *The Atlantic Monthly*, vol. 71, no. 427 (May 1893), 582. Beneath his poem honoring the Greek roots of the architecture at the Chicago Exposition, R.W. Gilder credits Bunner with coining the phrase "White City" to depict the Court of Honor and surrounding pavilions at the exposition (Richard Warson Gilder, "The White City," *Century Magazine*, vol. 46, no. 1 (May 1893), 22.

[95] Van Brunt, 90.

[96] David Brain, "The École des Beaux-Arts and the Social Production of an American Architecture," *Theory and Society*, vol. 18 (1989), 808.

[97] Albert Kelsey, ed., "Announcement," *The Architectural Annual*, vol. 2 (1901), 6; and Albert Kelsey, ed., "The 'Shyster's' Defence," *The Architectural Annual*, vol. 2 (1901), 14.

[98] "City of Paris," *AABN*, vol. 72, no. 1331 (29 June 1901), 99.

[99] Leopold Mensch, "The Hennebique System of Armored-Concrete Construction - II," *AABN*, vol. 78, no. 1406 (6 December 1902), 75.

technical problems under the architect's charge, Carrère argues, suggests that "association or collaboration may become necessary to ultimate success" in architectural practice.[100]

With this heightened attention to collaboration in the media, there is also evidence in the discourse of tensions between the ostensibly collective nature of architectural production and an architectural preoccupation with individual identity and authority. Amidst a general concern about public perception of the profession, architect Cass Gilbert sued organizers of the 1904 Louisiana Purchase Exposition in St. Louis for breach of contract, bitterly complaining that the promised collaboration on "matters of design, sculpture, and color treatment" had not come to fruition. [101] "On the contrary," he testified, "the sites of buildings have been arbitrarily changed many times, and, so far as the buildings placed in my hands are concerned, many changes in the sculpture and decorations have been made without any consultation whatever with us." [102] In 1912, well before tentative efforts in the 1920s and 30s by the AIA to codify relationships with material producers and suppliers, a writer extolling the virtues of collaboration between architects and manufacturers noted that such arrangements hold the potential for profitable development of innovative building materials without impinging on the architect's "professional standing." [103] Several years later, a Philadelphia real estate developer commissioned three esteemed "gentlemen architects" -- Messrs. Gilchirst, Duhring, and McGoodwin -- for a new residential community, but their concerns about individual identity, authority, and authorship necessitated an "amicable collaboration" in which each architect worked semi-autonomously on stylistically-diverse neighborhoods to produce a "harmonious result in the aggregate." [104]

This new iteration of collaboration as "adherence to a general and somewhat elastic outline of requirements" breaks from previous assumptions that collaborators either mask

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[100] John M. Carrère, "Making a Choice of a Profession - IX - Architecture," *The Cosmopolitan: A Monthly Illustrated Magazine*, vol. 35, no. 5 (September 1903), 494.

[101] "Cass Gilbert Resigns and Sues World's Fair," *The New York Times* (28 April 1904), 1. As an indication of the rising influence of early twentieth-century newspapers, H. Van Buren Magonigle expressed "a belief among many architects that the great dailies the country over do not accord to architecture the consideration it deserves, not only as a fine art of equal or greater importance than painting, sculpture, music and the drama, but as an all-pervading force working for good or ill upon the taste of every community . . . [which] must be educated to understand the work of the architect, to demand a high standard of performance on his part. . . I have been charged by my colleagues with the duty of presenting these general views to the managing editors of a few of the great newspapers. . .We had in mind a plan whereby, in the case of a newspaper not able to avail itself of the services of a qualified critic, to supply that as best we might by having critiques written by architects until the paper could find or train its own man; and to cooperate in any way he might wish, by collecting data, suggesting subjects for criticism that might not readily come to his notice, or in any possible way." (H. Van Buren Magonigle correspondence to Royal Cortissoz dated 3 February 1915, Royal Cortissoz Papers, YCAL MSS 146 Box 8, Beinecke Library).

[102] "Cass Gilbert," 1. Only months prior to Gilbert's lawsuit, sculptor Frederick W. Ruckstuhl resigned from the same exposition design team for similar reasons, arguing that the exposition staff "had not been in sympathy with… his desire to beautify and ornament" buildings at the exposition. Notwithstanding his complaints against exposition organizers, Gilbert later lamented more generally the lack of attribution for architects when working in collaboration with painters and sculptors, a theme Montgomery Schuyler took up again two years later in an article on the Gothic Revival ("Current News Section," *AABN*, vol. 93, no. 1694 (10 June 1908), 15; and Montgomery Schuyler, "The Old Greek Revival – Part II," *AABN*, vol. 98, no. 1826 (21 December 1910), 204.

[103] "Architect and Manufacturer," *AABN*, vol. 101, no. 1891 (20 March 1912), 139.

[104] Harold D. Eberlein, "Pastorius Park, Philadelphia and its Residential Development," *Architectural Record*, vol. 39 (January 1916), 24 and 34. Eberlein, a journalist of architecture and landscape described the arrangement as allowing each architect "considerable liberty in the choice of expression, so that his individuality of interpretation is not curtailed, it is so arranged, through amicable collaboration, that there shall be in the final *ensemble* neither jarring inconsistencies not disappointing incongruities" (Eberlein, 24).

evidence of their multiple hands -- as in Van Rensselaer's reviews of historical and contemporary art -- or multiple hands operating under a carefully prescribed plan of stylistic consistency as at the Chicago Exposition, and, furthermore, sets a precedent for the subsequent re-interpretation and re-invention of collaboration to be examined in this study.[105] It foregrounds, moreover, tensions in these early models of practice between an emerging twentieth-century collaborative ideal responsive to the increasing complexity and scale of architectural production, and a contemporaneous quest for architectural identity, authority, and authorship reliant upon a hierarchization of professional roles. It is in these tensions that we find early traces of a divide between the idealization and realization of collaboration, and a point of departure for the first of three case studies to follow.

[105] Ibid, 34.

Chapter Two

C. Grant La Farge:
Architecture as Art and the Historicist Agenda of Collaboration

The period from 1890 to 1930 saw the ascent of an architectural modernism that departed sharply from the prevailing historicism. American architects did not, however, universally embrace this new architecture premised on innovative construction technologies and an aesthetic program free of embellishment. More than an affront to stylistic sensibilities, architects resistant to the new architecture viewed it as an assault on their own professional livelihood and identity. Indeed, formalization of the architectural profession in the United States had to that point been intricately interwoven with an historicism characterized by revivalism, followed by a Beaux-Arts inspired classicism that found great favor amongst industrial, business, and civic patrons as an apt expression of economic and political authority. That the modernist upsurge from Europe evidenced hints of societal benefit for the masses only reinforced its perceived threat to historicist-minded architects who envisioned for themselves a professional status that might afford social, if not economic, parity with these very same patrons.

These aspirations for authority and privilege found manifestation in a pattern of socializing and clubbing common to the late nineteenth century that, coupled with specialized journals, university-level training, and an active representative association, contributed to the articulation of professional identity. Thomas Bender observes that precedent to the anointing of the university as a center of knowledge production and intellectual activity, the "learned world" of nineteenth-century American society, lacking the aristocratic court of early modern Europe for physical context and patronage, turned to libraries, shared-interest societies, and other urban cultural institutions for intellectual stimulation and companionship.[106] Expressive of class stratification of the period, intellectuals and professionals in the latter part of the century gathered amongst similarly-minded individuals in "specialized communities" offering "sharper and more exclusive cultural self-definitions."[107] Of vital importance to emerging professions in this period, Bender notes, was the drawing of explicit distinctions from "the swirl of amateurs, popularizers, and charlatans associated with urban culture -- and for valid intellectual as well as selfish personal reasons."[108]

Deborah Gardner adds that by the end of the nineteenth century, social and professional clubs exemplified by the Century, Players, and Groliers in New York City were critical venues for discourse amongst middle- and upper-class urban gentlemen representative of diverse sectors of society. These gentlemen, she notes, regularly maintained membership in multiple clubs, "those that were specific to their work . . . and others that broadened their social and business

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[106] Thomas Bender, "The Erosion of Public Culture: Cities, Discourses, and Professional Disciplines," in Thomas L. Haskell, ed., *The Authority of Experts: Studies in History and Theory* (Bloomington: Indiana University Press, 1984), 84-106. For a related discussion, see also Edward W. Said, *Representations of the Intellectual: The 1993 Reith Lectures* (New York: Vintage Books, 1994).

[107] Ibid., 98.

[108] Ibid.

networks." [109] These clubs were not, as Susanna Ashton explains, for the faint of heart. "Clubs could be formed and dissolved very suddenly and the competition to belong to the most prestigious clubs was tremendous." [110] More importantly for the purpose of this discussion, Ashton observes in the realm of the literary arts -- her area of scholarly interest -- a nexus between clubbing and collaboration. She notes that amidst broad societal attention at the turn of the century to the purported legitimatizing benefits of professionalization, clubs offered both safe haven and a supportive environment for "like-minded" gentlemen intent on transforming through collective action the nineteenth-century "man of letters" into a modern-day professional, while nonetheless retaining a romanticized notion of the solitary author as fount of creativity.[111]

Ashton's observation is equally applicable in an architectural context. It also serves as precedent, framed by issues of identity, authority, and authorship arising from the literature review, for consideration in this chapter of an early twentieth-century agenda of collaboration promulgated by historicist-oriented architects intent upon countering a surging modernism; an agenda empowered by the collective nature of social and professional clubs that nevertheless privileged the authorship, authority, and identity of the individual architect.[112] Whereas modernists imagined collaboration inspired by Renaissance guilds -- a topic to be taken up in the next chapter -- historicists gave credence to a transformative, universal beauty modeled on the physicality of the Renaissance -- itself a scholarly romanticization by Jacob Burckhardt and others -- and idealized collaboration as the integration of architecture and the arts essential to that beauty. Rooted in elite clubs catering to historicist interests, historicists pursued an agenda to disseminate their iteration of collaboration through specialized and general circulation journals, formal educational programs, and endorsement by professional associations and public agencies. To exemplify this agenda and its defense of the status quo against the modernist paradigm, I focus in this chapter on the activities of C. Grant La Farge (Image 1), an architect, avid lecturer, and officer of the AIA and the American Academy in Rome. By expanding that focus to encompass La Farge's circle of influential clubbing companions, I demonstrate how civic and professional associations afforded venues for promotion of the historicist agenda of collaboration and access to political and cultural authority for its implementation.

Background: C. Grant La Farge

La Farge was the first-born son of the renowned painter, muralist, and illustrator, John La Farge (1835-1910) -- likened by art critic Royal Cortissoz to John Ruskin and Leonardo da Vinci -- who generated over his lifetime such a diversity of artistic production in stained glass,

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[109] Deborah S. Gardner, "Charles A. Platt in New York, 1900-1933," in Keith N. Morgan, *Shaping An American Landscape: The Art and Architecture of Charles A. Platt* (Hanover: The Trustees of Dartmouth College and University Press of New England, 1995), 100.

[110] Susanna Ashton, *Collaborators in Literary America*, 1870-1920 (New York: Palgrave MacMillan, 2003), 101.

[111] Ibid.,125-126. Similarly, Julien Benda observed in 1927 that the "modern writer...is not only in the service of a bourgeois which is in a state of anxiety, but that he himself has become more and more of a bourgeois, endowed with all the social position and respect which belong to that caste. The Bohemian man of letters has practically disappeared, at least among those who engage public interest." (Julien Benda, trans. Richard Aldington, *The Treason of the Intellectuals* (New Brunswick, NJ and London: Transaction Publishers, 2009), 166.

[112] For further discussion of the linkage between a Beaux-Arts "hegemony" and formalization of architecture as a profession, see the previously cited Brain (807-868).

painting, sketching, and photography that his work defies simplistic categorization.[113] His diverse artistic spirit so infused his son's upbringing that in her 1896 biography on John La Farge, Cecilia Waern lists two sons, C. Grant and Bancel (1865-1938), as amongst his "small body of pupils."[114] Frequent contact with his father's circle of notable colleagues including H. H. Richardson, Charles McKim, and Stanford White, led the younger La Farge to the study of architecture, initially at the seminal Beaux-Arts influenced program at the Massachusetts Institute of Technology from 1880 to 1881 -- just as William Ware departed for Columbia -- followed by tutelage under Richardson, whose highly regarded office and atelier showed evidence of his own training at the École.[115] La Farge subsequently worked in his father's eponymous decorative art studio in New York City as an architectural assistant alongside his MIT classmate George Lewis Heins (1860-1907).[116]

La Farge and Heins formed their own architectural partnership in 1886, leading to a portfolio of ecclesiastical and secular commissions that included an extensive program of

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[113] "Contemporary Members of the Architectural Profession," *The Brickbuilder*, vol. 24, no. 10 (1915), 261; Royal Cortissoz, "John La Farge," *Outlook*, vol. 84, no. 9 (27 October 1906), 479; and Royal Cortissoz, *John La Farge: A Memoir and a Study* (Boston and New York: Houghton Mifflin Company, 1911; facsimile reprint, New York, 1971), 262, as cited in Helene Barbara Weinberg, "John La Farge: The Relation of his Illustrations to his Ideal Art," *American Art Journal*, vol. 5, no. 1 (May 1973), 54.

[114] Cecilia Waern, *John La Farge: Artist and Writer* (London: Seeley & Co. Limited., 1896), 71. At times, La Farge found himself the model for his father's drawings and paintings. Reference is made to the inclusion in an exhibition of a portrait study by John La Farge of his eldest son, C. Grant La Farge, in Josephine L. Allen, "Exhibition of the Work of John La Farge," *Bulletin of The Metropolitan Museum of Modern Art*, vol. 31, no. 4 (April 1936), 75. The same exhibition included a reproduction of the mural entitled "The Visit of Nicodemus to Christ" that John La Farge painted at the H.H. Richardson-designed Trinity Church in Boston (Allen, 76). See also James L. Yarnall, "New Insights on John La Farge and Photography," *American Art Journal,* vol. 19, no. 2 (Spring 1987), 53-54. The eminent theologian John La Farge, S.J. was also a younger brother of C. Grant La Farge (Oliver La Farge correspondence to Royal Cortissoz dated 2 November 1932, Royal Cortissoz Papers, YCAL MSS 146 Box 7, Beinecke Library).

[115] James L. Yarnall, "Brilliant but Stormy Collaboration: Masterworks of the American Renaissance by John La Farge, Charles Follen McKim, and Stanford White," *American Art Journal*, vol. 33, no. 1-2 (2002), 34-37. The origin of American atelier-based training rests with Richard Morris Hunt, the first American to study at the École des Beaux-Arts, who established an atelier in New York City modeled on his École experiences. William Ware, one of many notable architects who studied under Hunt, established his own atelier that became the basis of the seminal architecture programs at MIT and Columbia. Despite the significant influence of the École during this period, the number of Americans attending the school was relatively small, due to an exclusivity beyond the reach of most aspiring architects. See James Philip Noffsinger, *The Influence of the École des Beaux-Arts on the Architecture of the United States* (Washington, D.C.: Catholic University of America Press, 1955); and Joan Draper, "The École des Beaux-Arts and the Architectural Profession in the United States: The Case of John Galen Howard," in Kostof, 209-237.

[116] James L. Yarnell, *John La Farge in Paradise: The Painter and His Muse* (Newport, RI: William Vareika Fine Arts, 1995), 199.

decoration, signage, and fixturing for the New York City subway system in 1901 (Image 2).[117] The partners, selected over École-trained Carrère and Hastings and British-trained architect Robert W. Gibson, prepared their "classically-inspired" designs under the strict direction of engineer William Barclay Parsons and the Rapid Transit Board, which retained responsibility for the spatial layout, structural design, and construction of the stations.[118] In their work for the New York Zoological Park -- now Bronx Zoo -- Heins and La Farge continued to display assorted historicist influences with a collection of neo-classical pavilions constructed in the years 1899 to 1910.[119] The partners' most notable, and certainly most controversial, commission was that of the new Cathedral of St. John the Divine in New York City (Image 3), anticipated by the Episcopal Diocese to be the largest American religious edifice and, at half the size of St. Peter's

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[117] Their portfolio of work includes a chancel renovation at the Church of the Incarnation (1885-1886) in New York City. A fire in 1882 afforded the parish an opportunity to enhance the "austerely decorated" English Gothic-styled church with an elongated nave, new transept, and, from a design by Heins and La Farge, a new chapel containing two large murals by John La Farge based on earlier schemes for Trinity Church. (Helene Barbara Weinberg, " La Farge's Eclectic Idealism in Three New York City Churches," *Winterthur Portfolio*, vol. 10 (1975), 212; and Waern, 43). Additional projects by Heins and La Farge included the simplified Romanesque Reformed Episcopal Church of the Reconciliation (1890) in Brooklyn; the Renaissance-inspired St. Matthew's Roman Catholic Church (1899) in Washington, D.C. (David J. Framberger, "Architectural Designs for New York's First Subway," *Historic American Engineering Record* (National Park Service, HAER NY-122, 368-369); the Gothic cruciform-shaped Houghton Memorial Chapel (1899) at Wellesley College ("Wellesley College," *Self-Culture: A Magazine of Knowledge*, vol. 11, no. 1 (March 1900), 5); Holy Trinity Catholic Chapel (1900) at West Point Military Academy ("Highways and Byways," *The Chautauquan, A Monthly Magazine for Self-Education*, vol. 31, no. 5 (August 1900), 456); and the Renaissance-inspired St. James Cathedral (1905-1907) in Seattle, with a forty-foot high dome that collapsed under the burden of a snowstorm nine years after completion. Heins became State Architect of New York in 1899 under Governor Theodore Roosevelt and elevated as a fellow of the AIA in 1901 (Florence N. Levy, ed., *American Art Annual, vol. VI (1907-1908)* (New York: American Art Annual, Inc., 1908), 109; and "The Man About Town," *Town and Country* (15 July 1911), 35).

[118] For an in-depth discussion of the design and construction of the subway system, see Framberger, 365-412.

[119] With the participation of landscape architect Harold A. Caparn, Heins and La Farge prepared a Beaux-Arts inspired master plan for the park organized about a generally rectangular courtyard nestled into a hillside. They designed five fancifully detailed brick and limestone buildings surrounding the courtyard – the Primate House (1901), Lion House (1903), Large Bird House (1905), the domed Elephant House (1907-1908) at the terminus of the courtyard, and an administration building (1910), each appointed with stone and terra cotta animals by sculptors Eli Harvey, Charles R. Knight, and Alexander Phimster Proctor (*Landmarks Preservation Commission Report on Baird (now Astor) Court*, New York Zoological Park (Bronx Zoo), Designation List 315, LP-1888, 20 June 2000, 2); William T. Hornaday, *Popular Official Guide to the New York Zoological Park, Eleventh Edition - June 1, 1911* (New York: New York Zoological Society, 1911); and *Catalogue of the Seventeenth Annual Exhibition of the Architectural League of New York* (New York: Architectural League of New York, 1902, 42).

in Rome, the third largest Christian church in the world.[120] As at the New York Zoological Park and subway stations, La Farge and Heins resorted to Guastavino tile arch methodology (Image 4) -- La Farge rationalized it as "of the highest antiquity" -- but an over-reliance on traditional masonry techniques on a scale unprecedented in America, let alone for the young architects, contributed to a tedious pace of construction.[121] By 1903, after eleven years of tenuous relations with the cathedral committee over foundation difficulties, stylistic concerns, and delineation of architectural responsibilities, Heins and La Farge reluctantly accepted the inevitable: the cathedral would not be completed in their lifetime.[122] Indeed, Heins died unexpectedly in 1907 before completion of the cathedral, sparking a series of turnovers in the position of cathedral architect, while the cathedral fabric itself, which remains unfinished today, morphed stylistically from the hybridized Byzantine/Romanesque choir and crossing of Heins and La Farge to English

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[120] Henry Collins Brown, ed., *Valentine's Manual of the City of New York for 1916-7* (New York: The Valentine Company, 1916) 195. Just ten years of out of MIT, the young architects won the highly coveted commission in 1891 after a lengthy competition process that commenced in 1889 with sixty design submissions. A Cathedral Committee on Architecture narrowed the broad international field to thirteen candidates for analysis by "expert architects" Charles Babcock and William Ware, who in turn selected four finalists for display in 1891 at the National Academy of Design. (*Cathedral Church of Saint John the Divine, published by the Cathedral League* (New York: St. Bartholomew's Press, 1916, 20). After some refinements, the committee selected the Heins and La Farge Romanesque entry, with the expressed intent to reflect the "history and lineage" of the Episcopal Church. (George Heins and C. Grant La Farge, "Proper Disposition in the Way of Solidity, Permanence, and Economy in the Structural Scheme," *Description of the Design for the Cathedral of Saint John the Divine,* privately printed (Philadelphia: Globe Printing House, 1891), 17, The Archives of the Episcopal Diocese of New York at the Cathedral of Saint John the Divine). In an entry for George Heins in *The Twentieth Century Biographical Dictionary of Notable Americans, vol. 5* (Boston: The Biographical Society, 1903), reference is made to Heins having toured the great cathedrals of Europe in the period between selection as a finalist in 1889 and final selection in 1891, a tour that ostensibly helped Heins and La Farge to finalize their design.

[121] Heins and La Farge, 13. La Farge and Heins relied principally on a structural system embedded in the past, explaining in their competition submission that "the possibility of Iron or Steel ribs, filled in between with hollow brick Arches, Concrete or corrugated Iron, has not been considered, since it is well known that the life of Iron and Steel is limited, unless they are frequently re-painted; and it is a question whether even if completely built in, they will not oxide" (14). La Farge later wrote, "any such device as the modern steel frame, commercial and of unknown duration, is instantly to be dismissed; so, too, the indiscriminate use of the hasty and half-understood concrete, treacherous, but dear to the engineer. A building of masonry, with true vaulting, is the only possible thing." (C. Grant La Farge, "The Cathedral of St. John the Divine," *Scribner's Magazine*, vol. 41, no. 4 (April 1907), 386).

[122] *New York Sun*, undated, as cited in Walter B. Snow, "News from the Classes -1882" in *The Technology Review*, volume 5 (Boston: Association of Class Secretaries of the Massachusetts Institute of Technology, 1903), 100.

Gothic under Ralph Adams Cram, then again to a French Gothic in the nave at the hands of Carrère and Hastings.[123]

We see then in La Farge's portfolio of work with Heins clear evidence of an eclectic historicism that mirrored prevailing architectural tendencies at the turn of the century. It was equally consistent with his teleological view of architecture as embodying the "long centuries of man's slow growth, his struggle upward toward perfection," against a modernism he dismissed as "chaos, ignorance, lawlessness, and a carnival of eccentricity."[124] Yet, while this penchant for architecture firmly rooted in the past highlights his stylistic arguments against modernism, of greater import are the personal and professional relations La Farge nurtured in this period, for, as I shall demonstrate, these contacts afforded him access to elite and influential venues for launching a vigorous defense of historicism and, with it, promotion of a decidedly historicist iteration of collaboration delineated around architects and artists.

La Farge's clubbing activities centered on "exclusive" gathering places such as the Century Club in New York City where fellow members, including architects Carrère, Charles Platt, Thomas Hastings, Richard Morris Hunt, Russell Sturgis, and William Boring, sought

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[123] Cathedral records list as architects associated with the design and development of the cathedral: the partnership of Heins and La Farge; C Grant La Farge as individual practitioner; Ralph Adams Cram as individual practitioner; the partnerships of Cram, Goodhue and Ferguson and Cram and Ferguson; the partnerships of Cook and Welch, Carrère and Hasting, Warren and Wetmore, and Howells and Stokes; and Henry Vaughan as individual practitioner (*Cathedral Church of St. John the Divine, published by the Cathedral League* (New York: St. Bartholomew's Press, 1916), 59). A 1921 Cathedral guide elaborates on the timing of architectural responsibilities as follows: "The Architects of the Cathedral have been: George L. Heins and C. Grant LaFarge from July 1891 until Mr. Heins' death in September, 1907; Mr. LaFarge from September, 1907, until the completion of the Choir in April, 1911; and Messrs. Cram & Ferguson from April, 1911, to the present time. Mr Henry Vaughan was architect of three of the Seven Chapels of Tongues, Messrs. Heins & LaFarge of two, Messrs. Cram & Ferguson of one and Messrs. Carrere & Hastings of one, as mentioned hereafter." (Edward Hagaman Hall, *A Guide to the Cathedral Church of St. John the Divine in the City of New York* (New York: The Laymen's Club of the Cathedral, 1921), 23-24.) The loss of the commission after many years of battling stylistic, technical, and budgetary problems proved to be a "painful" topic for La Farge, presumably finding no solace in Melani's previously cited 1891 assertion of a sequential "collaboration" amongst Renaissance architects on works of enormous scale and importance such as St. Peter's in Rome (L. Bancel LaFarge correspondence dated 4 July 1957 to James Van Derpool, Episcopal Archives). Editors of *AABN* did, however, demonstrate some sympathy for La Farge, recalling that "[f]ew truly great and monumental structures have ever been successfully carried forward based on one man's ideas. The work of the architects of the first instance [Heins and La Farge] will live and have its effect equally important with that of their successors, and, as it is impossible that this cathedral will attain completion during the lives of the present generation, we may expect to see the work of Mr. Cram supplemented by some man who is perhaps to-day toiling over his drafting board, a student in some atelier in this country." ("Misleading Press Reports and Criticisms," *AABN* (5 July 1911), A7). For his part, Cram argued that he had not "displaced" La Farge as design architect of the cathedral, rather that he had accepted a new position as "consulting architect to the Cathedral" ("Current News and Comment," *AABN*, vol. 101, no. 1892 (27 March 1912), 4).

[124] C. La Farge, "Lincoln and Compulsory Greek," *The Independent*, vol. 74, no. 3356 (27 March 1913), 693. La Farge nonetheless held no allegiance to a single stylistic precedent, suggesting in the case of the Catholic Church that its architecture need not be "French nor English, Italian nor Spanish; not Byzantine, Romanesque, Gothic nor Renaissance; bound neither to the time when the Pagan basilica was diverted to the uses of the Christian church, nor to that of the glorious medieval efflorescence, nor to the days of the Great Separation; but that potentially all of these are hers, so that she may make wise use of them according to site and climate, material resources and structural needs." (C. Grant La Farge, "Catholic Church Architecture," *The Brickbuilder*, vol. 15, no. 5, (January/December 1906), 94).

"social enjoyment."[125] For more diverse companionship, La Farge, Platt, and Hastings frequented The Coffee House, a club organized in 1915 by Vanity Fair editor Frank Crowninshield, architect Chester Aldrich, and artist Paul Manship, and boasting a membership roster that included authors Herbert Croly, John Jay Chapman, and Owen Wister, playwright Louis Shipman, publisher Charles Scribner, critic Royal Cortissoz, and architects William Adams Delano, Bertram Goodhue, and John Russell Pope.[126]

Beyond mere companionship, clubbing offered La Farge and his colleagues platforms for articulating architecture as a distinct profession intimately aligned with the arts, while, paradoxically, given the elite characteristics of clubbing, endeavoring to dispense with a perception dating to the Renaissance of architecture as an amateur pursuit for the leisure class. In shared-interest associations such as the Architectural League of New York -- a showcase of exemplary historicist thinking initiated in 1881 by Cass Gilbert and others intent upon ridding the public of "its predilection for evil ways of building" while "supplying the want of social intercourse" -- architects and artists found common ground through lectures, discussions, and exhibitions that reinforced connectivity between realms of practice, while burnishing a critical image of collaboration as the physical integration of architecture and its sister arts.[127] La Farge contributed drawings of his own work to exhibitions sponsored by the League, including study sketches for the animal buildings at the New York Zoological Park, and, with his artist brother Bancel, joined the League in 1902, rising six years later to the position of League president.[128] This emerging professional authority brought La Farge in contact with notable painters such as Frederick Deilman, Kenyan Cox, C. Y. Turner, and Edwin Blashfield -- the latter two cited by *The New York Times* in 1897 for their "unusually important" murals for the Astoria Hotel ballroom and frieze -- sculptors J. W. Alexander, Herbert Adams, H. A. MacNeil, Daniel French, and Paul W. Bartlett, and the influential art critic Royal Cortissoz, his father's biographer (Image 5).[129] Whereas La Farge wrote and spoke for the most part to a professional audience, the efforts of Cortissoz on behalf of the historicist agenda were for public consumption, apropos given his

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[125] *The Century 1847-1946* (New York: The Century Association, 1947), 216, as cited in Gardener, 101. Ashton notes that William Cullen Bryant founded the Century Club in 1847 and it soon thereafter became, in Mark Twain's words, 'the most unspeakably respectable club in the United States, perhaps" (Mark Twain, *Mark Twain's Travels with Mr. Brown*, Franklin Walker and G. Ezra Dane, eds., (New York: Knopf, 1940), 88, as cited in Ashton, 101). John La Farge joined the Century Club in 1860 and C. Grant La Farge followed suit in 1892 (*Reports, Constitutions, By-laws, and List of Members of The Century Association for the Year 1902* (New York: The Knickerbocker Press, 1903), 96 and 119). The architect/artist Charles A. Platt served at one point as president of the club (Royal Cortissoz, "Charles Adam Platt, 1861-1933," *The Architectural Forum*, vol. 59, no. 4 (October 1933), 17).

[126] Gardner, 101.

[127] Roger Riordan, "The Architectural League of New York," *Century Illustrated Magazine*, vol. 25, no. 5 (March 1883), 699; and "The Architectural League of New York," *AABN*, vol. 9, no. 277 (16 April 1881), 184.

[128] *Catalogue of the Thirteenth Annual Exhibition of the Architectural League of New York*, New York: Knickerbocker Press (1898), 121; *Catalogue of the Seventeenth Annual Exhibition of the Architectural League of New York*, New York: Architectural League of New York (1902), 9; *Catalogue of the Eighteenth Annual Exhibition of the Architectural League of New York*, New York: Architecture Press (1903), 8; "Societies," *AABN*, vol. 93, no. 1691 (20 May 1908), 18; *Architectural League of New York Yearbook and Catalogue of Twenty-fourth Annual Exhibition*, New York: Press of the Kalkhoff Company (1909), title page; and "Twenty-Fourth Annual Exhibition, Architectural League of New York," *AABN*, vol. 95, no. 1729 (10 February 1909), 44-45.

[129] "Art at Home and Abroad," *The New York Times*, January 31, 1909, x6. French and Bartlett were amongst the founders of the National Sculpture Society, along with Stanford White, Augustus St. Gaudens, and Richard Morris Hunt, some of whom were colleagues of La Farge's father at the American Academy in Rome.

self-portrayal, as Wayne Morgan notes, as the gatekeeper between art and society.[130] He zealously believed that art ought to be based on ideas steeped in tradition, that beauty should be grounded in harmony and order, and that workmanship must be of a recognizable style. His regular contributions to the *Herald Tribune* and *Scribner's Magazine* contained diatribes against modernism -- "sterile," "almost fanatical indifference to beauty, and a deplorable neglect of the fundamentals of workmanship" -- and predicted that it "will someday prove a kind of Victorian 'dud,' with a difference, obviously, but a 'dud' just the same."[131] He observed that so-called modernists

> regard the past as something that is, in a very literal sense, departed, finished, filed and docketed, as those the schools were so many isolated phenomena, each confined to its watertight compartment. The truth is, of course, that the past is a long series of continuing processes, dateless and eternal. . . The past does not discourage the present but enlightens it and renews its power."[132]

Models of historicist thinking for Cortissoz were Pope, Manship, and Ezra Winter -- all members, with Cortissoz and La Farge, of the Coffee House in New York -- whose work collectively evidenced the past as a limitless font of "fundamental principles with which to adorn the present and express modern individuality."[133] In addition to his regular art critiques and a biography on La Farge's father, John -- who had himself once bemoaned "the lack of coordination between the mural painters and the architects" -- Cortissoz wrote frequently of architecture and of the architect, who he considered to be "nothing if not an artist, a sensitive creature, full of imagination and personality."[134] He heaped praise on the Beaux-Arts inspired accomplishments of Hunt, Burnham, Platt, and the McKim partnership, and spoke specifically of a "perfect artistic sympathy" between Stanford White and Joseph M. Wells, his "head man" in the studio.[135] Similarly, in describing the work of Richardson and John La Farge at Trinity Church -- the "first great exemplar of collaboration" -- Cortissoz noted that "Richardson had supplied the organism. La Farge had illumined it with color. 'United Labor' had made a beautiful interior."[136]

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[130] H. Wayne Morgan, *Keepers of Culture: The Art-Thought of Kenyan Cox, Royal Cortissoz, and Frank Jewett Mather, Jr.* (Kent, OH and London, England: The Kent State University Press, 1989), 64.

[131] *Time: The Weekly Newsmagazine*, vol. 15, no. 10 (10 March 1930).

[132] Royal Cortissoz, "Our Debt to the Past," *The American Magazine of Art*, vol. 18, no. 7 (July 1927), 350.

[133] Ibid.

[134] Royal Cortissoz, *John La Farge: A Memoir and a Study*, Boston and New York: Houghton Mifflin Company (1911), 224; and Royal Cortissoz, "Vitality of Tradition," *The Architectural Forum*, vol. 52, no. 5 (May 1930), 635. Further writings on John La Farge include "John La Farge," *Outlook*, October 27, 1906, 84-90. Cortissoz became an honorary member of the AIA at its sixty-first annual convention in May 1928 (Edward Kemper correspondence dated 9 June 1928 to Royal Cortissoz, Royal Cortissoz Papers, YCAL MSS 146 Box 1, Beinecke Library).

[135] Remarks by Royal Cortissoz as cited in a pamphlet entitled "Memorial Meeting in Honor of the late Stanford White held at the Library of New York University for the dedication of the Stanford White Memorial Doors," 10 December 1921, privately printed, New York (1921), 10, Royal Cortissoz Papers, Beinecke Library. On Burnham, see Royal Cortissoz, "Creative Americans: An American Architect," *Outlook*, vol. 86, no. 13 (27 July 1907), 681-685; on H. H. Richardson, Richard Morris Hunt, Charles F. McKim, and Daniel Burnham, see Royal Cortissoz, "Four Leaders in American Architecture," chapter in *Art and Common Sense* (New York: Charles Scribner's Sons, 1913), 381-432.

[136] Royal Cortissoz, "The Art of Collaboration," *Architecture*, vol. 56, no. 4 (October 1927), 181.

On matters of style, Cortissoz shared much with the younger La Farge. He was fond of the "École idea" as one of "discipline, of intelligence. As Cortissoz explained:

> It doesn't, in the hands of a good architect mean just a mansard roof and indiscriminate decoration. It means, instead the application of thought to a definite problem, the study of every architectural organism, whether it be a house, a barn, a public building or a bridge as an organism. It relies to certain extent upon the precedents of the past. It leans upon tradition, and its greatest peril is that of the formula, but it deals essentially in architectural principles.[137]

At the 1923 AIA Gold Medal ceremony for Henry Bacon held at the foot of the Bacon-designed Lincoln Memorial, Cortissoz, who authored the entablature inscription atop the memorial, glorified its "majesty, its strong refinement, its simplicity, its beauty, its monumental serenity."[138] For both Cortissoz and La Farge, the archetype for such decency and order was the Italian city, in which the sister arts of architecture, painting, sculpture join "in the production of one effect, all working in the grand style."[139] This physical synthesis was for these men the essence of collaboration, the outcome of assembling in one place suitably inspired representatives of the sister arts. This was a topic that held great interest for Cortissoz yet he was unable, as was La Farge, to explain precisely how it came about. It was, as the noted literary critic Brander Matthews (1852-1929) had observed a half-century earlier about literary collaboration, both an art and a mystery.[140] Matthews, according to Ashton, considered

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[137] Royal Cortissoz, "The Beaux-Arts Institute of Design: A Clearing House for the Serious Art Student," undated article from the *New York Tribune* re-printed in *Carnaval de Paris*, Royal Cortissoz Papers, YCAL MSS 146 Box 1, Beinecke Library).

[138] Royal Cortissoz, "The Architect: Address of Royal Cortissoz," *Proceedings of the Fifty-sixth Annual Convention of the American Institute of Architects* (Washington, D.C.: Board of Directors of the American Institute of Architects, 18 May 1923), 86. As recorded in the *Proceedings*, in presenting the award to Bacon, President Harding said: "So, in presenting this testifying medal to you, Mr. Bacon, we would testify also our appreciation and pride in the contributions of those who have been your coadjutors in bodying forth the substance of ennobling thought, the glory of beauteous conception. Out of the crudest materials, you and those who have wrought with you and after you, have given us this creation who simple grandeur has arrested the eyes and thoughts of whoever loves the beautiful and appealing. You have reared here a structure whose dignity and character have won it rank among the architectural jewels of all time. You have brought to your countrymen a swelling pride in the thought that they have been capable of producing such an inspiring and such a masterful execution." ("Address of President Harding Bestowing the Gold Medal of the American Institute of Architects upon Henry Bacon, Architect of the Lincoln Memorial," *AIA Proceedings* (1923), 87. La Farge defended the memorial against accusations in *The Independent* that it embodied pagan worship of antiquity, vehemently arguing that opponents of the memorial would "persuade us to ignore the long centuries of man's slow growth, his struggle upward toward perfection; to set aside, as of no worth, all his experience of the need to follow in known and proven paths if his footsteps shall lead him to any sure result. You would have us substitute chaos, ignorance, lawlessness, and a carnival of eccentricity, for decency and order." (La Farge, "Lincoln and Compulsory Greek," 693).

[139] Royal Cortissoz, "American School of Architecture in Rome," *Harper's Weekly*, vol. 39 (15 June 1895), 564-65, as cited in Morgan, *Keepers of Culture*, 89.

[140] Brander Matthews, "The Art and Mystery of Collaboration," *Longman's Magazine*, vol. 16, no. 92 (June 1890), 157. Cortissoz and Matthews were acquaintances, judging from four handwritten correspondence from Matthews to Cortissoz dated 4 August 1914, 17 March 1919, 18 July 1920, and 17 March 1922 (Royal Cortissoz Papers, Beinecke Library), and a book review noting that Cortissoz had included in his biography on John La Farge an "entertaining story" about a dinner conversation between Matthews and La Farge ("The Life of a Great Artist," *The New York Times* (June 11, 1911), page unknown). Branders was also, as was La Farge, a close friend of Theodore Roosevelt, according to Ashton (Susanna Ashton, "Authorial Affiliations, or, the Clubbing and Collaborating of Brander Matthews," *Symploke*, vol. 7, no. 1-2 (1999), 165-187)

collaboration, which he employed extensively as a technique in his own literary explorations, as the "natural outpouring of an almost spiritual commonality amongst individuals.[141] Cortissoz similarly acknowledged this commonality of spirit amongst collaborators, but felt that such ideas on collaboration "make by themselves a fascinating subject, the more fascinating, for me, because anything like a conclusive philosophizing of them is perpetually elusive."[142] Cortissoz continued:

> Collaboration is one of those counsels of perfection in the adoption of which . . . it is prodigiously important to look before you leap. It is an unimpeachable assertion that the art can be taught but when it comes to the execution of a job it is terribly important that the right men for it should be found. . . I simply feel that collaboration somehow cannot be definitely organized. It happens. It waits . . . for the chosen, the man with the mark of the gods upon him.[143]

Nurturing the Historicist Identity

The man with the mark of the gods upon him. This was, for Cortissoz and La Farge, not just any individual, for theirs was a collaboration of "like-minded" architects and artists rubbing shoulders in the comfort of clubs and shared-interest societies. In an effort to perpetuate this identity, La Farge and his colleagues nurtured the next generation of historicists at the American Academy in Rome. Founded in 1894 by John La Farge, Charles McKim, Daniel Burnham, Augustus Saint-Gaudens, H. Siddons Mowbray, Daniel French, and Edwin Blashfield in the wake of the World's Columbian Exposition in Chicago, it was a place where "the artist will have his imagination more stirred, that his comprehension will be more acute, if in his study of the past he knows all that he can of the lives and the manners of those whose expressions he studies – of what caused those expressions."[144] Set within the Eternal City, a select few, having already gained elsewhere their rudimentary architectural training and demonstrated through demeanor and portfolio their worthiness, would "work together, play together; travel together, learn to know each other; discuss amongst themselves their different problems; their artistic aspirations; their impressions," thereby breeding men who would carry forth collaboration and its historicist overtones as an intrinsic aspect of professional practice.[145] "We attach distinct weight to the element of character in the men who are to go to Rome," La Farge wrote in a letter addressed to deans of American architectural schools, "and by that character, as well as by artistic attainment, justify our selection and our expectation that they will be a credit to the Academy, and a distinguished influence in their competition."[146]

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[141] Ashton, "Authorial Affiliations," 166.

[142] Cortissoz, "The Art of Collaboration," 181.

[143] Ibid., 183 and 185.

[144] C. Grant La Farge, "The American Academy in Rome," *AIA Journal*, vol. 3, no. 2 (February 1915), 56-57. For further discussion of the Academy, see Lucia Valentine and Alan Valentine, *The American Academy in Rome: 1869-1969* (Charlottesville: University Press of Virginia, 1973) and Fikret K. Yegül, *Gentlemen of Instinct and Breeding: Architecture at the American Academy in Rome, 1894-1940* (New York and Oxford: Oxford University Press, 1991).

[145] C. La Farge, "A Glimpse at the Future of Collaboration," *AIA Journal* (August 1927), 252.

[146] C. Grant La Farge correspondence to Dean F. H. Bosworth, Jr, 28 March 1928, Department of Architecture Archive, Box 6, 15/1/512, Rare and Manuscript Collections, Carl A. Kroch Library, Cornell University.

The Academy was not, as La Farge made quite clear, a school for the "teaching of technique" or empirical study of collaborative methodology. Rather, amidst the "illustrious" antiquities of Rome, architects might be infused with the spirit of the past and, in sympathy with fellow artisans, acquire the collaborative spirit.[147] Such spirit was to be achieved, La Farge explained, "by throwing the chosen men themselves together, for sufficient lengths of time, in close personal association during their formative period, and in the constant, richest atmosphere of such masterpieces as will tell them the story over and over again."[148] To further his argument, La Farge cited an unnamed French critic who claimed that collaboration was

> not merely working together. That alone is not enough. It is rather the cohabitation of minds. The word he uses is *esprit*, difficult to translate exactly, for in French it has so many shades of meaning. . . We have, then, the right to conclude that the task laid upon us is so to educate young minds that they may worthily cohabit, to the end that from their fertility may come splendid offspring. Sort of eugenic schooling, as it were.[149]

To sustain this strategy, trustees and faculty for the Academy represented the breadth of the classics -- archaeology, history, literature, architecture, and the arts -- many of whom were leading historicist-oriented practitioners of their day, including William Rutherford Mead, Breck Trowbridge, and William A. Boring, a member, with La Farge, of both the Century Club and the Coffee House.[150] It was a pedagogical program heavily reliant upon collaboration across disciplines applied to "material expression" at all conceivable scales: "landscape setting, town planning, groups of buildings, as well as individual structures; architecture enriched and vivified by the sister arts of painting and sculpture."[151] Academy Fellows participated in an annual Collaborative Problem intended to "afford them an excellent opportunity to match up their ideas and to realize the oneness of their arts."[152] For the 1928 Collaborative Problem, musicians

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[147] La Farge, "A Glimpse," 253. By locating the Academy amidst the antiquities of Rome, its benefactors intended for architects and artists to "come in contact with the Italian tradition, and should know not only painting, but the architecture, the mosaics, the applied arts, of the country." (Royal Cortissoz, "An American Academy at Rome," *Harper's New Monthly Magazine*, vol. 90 (December 1894 - May 1895), 628. As if to emphasize the success of this strategy, Cortissoz noted several decades later: "Observe certain men who have returned in their time from the American Academy in Rome. Think of John Russell Pope, who built the superb Scottish Rite Temple in Washington. Did not his Roman studies help him to make that a masterpiece? Look at the decorations which Ezra White painted for the Cunard Building in New York. Would they have been so beautiful if he had never seen the Borgia apartments in the Vatican? Would Paul Manship have produced so many beautiful sculptures if he had never been in Rome? I doubt it." Royal Cortissoz, "The Secret of the American Academy in Rome," *American Magazine of Art*, vol. 13, no. 11 (November 1922), 461. A question remains, however, whether the buildings and ruins of Rome were in fact the principal prototypes for subsequent historicist architectural production in America or, as exemplified by historicist icons such as the Cunard Building in New York City, if the true inspiration might have been located in Florence.

[148] C. Grant La Farge, "The American Academy," 64.

[149] La Farge, "A Glimpse," 253.

[150] American Academy in Rome: Its Unique American Educational Work in Italy," *AABN*, vol. 116, no. 2296 (24 December 1919), 783-784.

[151] La Farge, "The American Academy," 63.

[152] "The American Academy in Rome during January 1928," unpublished newsletter, 1, Department of Architecture Archives Collection, Box 6, 15/1/512, Cornell Archives.

joined with architects, painters, and sculptors to develop designs for a hypothetical Temple of Music located in a "warm southern clime." [153]

In his unceasing promotion of the Academy, La Farge was fond of citing the twenty-five story Cunard Building (1919-1921) (Image 6), designed by Benjamin Wistar Morris, as the embodiment of Academy teachings.[154] After termination of their brief partnership in 1915, Morris went on to design a number of significant contributions to the ever-rising New York City skyline -- the Bank of New York and Trust Building (1927-1929) and the Continental Bank Building (1929-1932) -- but it was the Cunard that most captured La Farge's attention.[155] Of particular interest was that the artists gathered around Morris "to make the great hall of the Cunard Building the distinguished thing it is" were all fellows of the Academy.[156]

> Mr. Morris has told us how the architect restrained his own hand in order that these other hands might have their competent way: how they worked together in harmony so that in his own words: 'We were one happy family.' [157]

From this example, La Farge generalized two ingredients for collaboration. First, that the architect not concern himself with "his own overwhelming importance," and secondly, that he comprehend and be sympathetic to the contribution artists can make to cohesive built form, ingredients intrinsic to the pedagogical strategy at the Academy. [158] Cortissoz similarly attributed the "organic" cohesiveness of the Cunard to collaboration amongst the École-trained Morris and the Academy-trained artists. [159] In an era when the "pressure of commercial conditions" contributed to poorly conceived and executed buildings -- Albert Kelsey, a former partner of Paul Philippe Cret, bitterly complained to Cortissoz that the "intensely progressive business age . . . makes it almost impossible . . . to do something permanent and beautiful" -- Cortissoz extolled the Cunard for its "convenience, the ingenious handling of space and…its

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[153] Ibid.

[154] The eclecticism in the work La Farge accomplished with Heins was present again in his subsequent partnership from 1910 to 1915 with Benjamin Wistar Morris (1870-1944), who received his training at Columbia University and the École des Beaux-Arts before embarking on an architectural career with Carrère & Hastings. In their short time together, the partners prepared an array of eclectic designs including the Architects' Building (1912) at 101 Park Avenue -- where La Farge and Morris, Charles Platt, and McKim, Mead & White maintained offices -- an early Georgian-style mansion (1913) for J. Pierpont Morgan, Jr. in Glen Cove, New York, and, in partnership with Charles H. Cullen, a warehouse at 5 Little West 12th Street (1913) in New York City for the Astor family real estate empire. In addition to the beneficial connections with the Morgan and Astor families, Duncan Candler, who worked with La Farge and Morris, provided ongoing services to the Rockefeller family, including a demonstration dormitory for female factory workers in Charleston, S. C., an expansion of J. D. Rockefeller Sr.'s home and an art gallery for Abby Aldrich Rockefeller on Fifty-forth Street in New York City, and a playhouse at the family compound in Pocantico Hills. Between 1915 and his death in 1938, La Farge worked in the firms of La Farge, Warren & Clark; La Farge, Clark & Creighton; and La Farge & Son. ("Current News and Comment," *AABN*, vol. 107, no. 2040 (27 January 1915), 61; Anthony K. Baker, Carol A. Traynor, Bob B. MacKay, eds., *Long Island Country Houses and their Architects* (New York: W. W. Norton & Company, Inc. (1997), 240; Jay Schockley, *Gansevoort Market Historic District Designation Report*, New York: New York City Landmarks Preservation Commission (2003), 11 and 45; and "Newsletter," (New York: Rockefeller Archive Center, Spring 2006), 13).

[155] Carol Willis and Daniel Abramson, *Skyscraper Rivals* (Princeton: Princeton Architectural Press, 2000), 116.

[156] La Farge, "A Glimpse," 252.

[157] Ibid.

[158] Ibid.

[159] Royal Cortissoz, "The Cunard Building," *The Architectural Forum*, vol. 35, no. 1 (July 1921), 4.

beauty, the proof it affords that a skyscraper may be made a work of art." [160] He waxed eloquently about the harmony of architectural and artistic effect: the lobby "travertine sets the whole in a mellow key and in Barry Faulkner's immense maps on the walls, showing the Cunard routes, and in Ezra Winter's paintings on the ceiling and the four pendentives, illustrating the history and mythology of the sea, this key is transmuted into sumptuous warmth." [161] This harmonious effort, he insisted, was directly attributable to the pedagogical program at the Academy and its "principle of artistic refinement." [162] "Yet always," Corstissoz noted, "and this is where one recognizes at their best the influences of the Roman Academy -- the painter's delightful fervor is kept wonderfully in check." [163]

The Academy founders' commitment to Rome did not, however, dissuade La Farge and colleagues from contemplating dissemination of the collaboration-based pedagogy of the Academy to American architecture programs, Emboldened by a merger of the Academy with the School of Classical Studies in Rome in 1912, La Farge reasoned that the success of the Academy as measured by outcomes such as the Cunard warranted its broader application "from the very beginning" of architectural training.[164] Collaborative programs were already in place at American institutions -- for instance, the Beaux-Arts Institute of Design in New York, where Benjamin Wistar Morris and Philip L. Goodwin served as trustees, the Fontainebleau School, and Yale School of Fine Arts -- but, as Frederick L. Ackerman reported to the AIA, the prognosis for

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[160] Albert Kelsey, FAIA correspondence to Royal Cortissoz dated 22 August 1923, Royal Cortissoz Papers, YCAL MSS 146 Box 7, Beinecke Library); and Cortissoz, "The Cunard Building," 1.

[161] Cortissoz, "The Cunard Building," 5.

[162] Ibid.

[163] Ibid., 6.

[164] La Farge, "A Glimpse," 254; and "Fine Arts," statement of resolution by C. Grant La Farge as secretary of the American Academy in Rome in *Value of the Classics*, *a record of the Addresses delivered at the Conference on Classical Studies in Liberal Education held at Princeton University, June 2, 1917, together with an introduction and a collection of statements and statistics* (Princeton: Princeton University Press, 1917), 325-326. Statements from other notables including R. Clipston Sturgis, Frank Jewett Mather, Jr. (professor of art and archaeology at Princeton), John Galen Howard (director of the school of architecture at University of California), architects Thomas Hastings (New York), Ralph Adams Cram (Boston), and Irving K. Pond (Chicago), sculptor Daniel K. French , and painter Edwin H. Blashfield.

collaboration was "rather gloomy." [165] Reflecting an increasing isolation of the design professions in academia, collaboration in practice, Ackerman observed, was "little more than a word which represents a very vague ideal rather than an actual condition of fact," attributable in great measure to inadequate attention in academia. It is a rather nebulous ideal which remains nebulous through our persistence in the use of values which apply alone to that narrow field in which we are individually engaged." [166]

La Farge sought to "improve" upon these prevailing conditions by enlisting the AIA in an effort to encourage architectural education "along the collaborative road," not an insignificant undertaking since, as Hyungmain Pai notes, nineteen new architectural schools emerged between 1912 and 1922 leading to a tripling of architectural students by 1930.[167] Speaking to a receptive audience at Yale, he remarked:

> One thrills to the thought of what this may ultimately mean, -- Yale, and other great schools the country over, as one after another they fall into line, giving to our ardent youth such true insight into the unity and brotherhood of all the arts as never our history has known.[168]

La Farge elaborated on collaboration as a unification of the arts, harkening back to the grounds and pavilions of the Chicago Exposition, which, as with previous writers, he attributed directly to the interdisciplinary collaborative effort underlying its production. Of particular interest to La Farge was that the Exposition was the outcome of collaboration amongst architects, painters, and sculptors, the

> first occasion upon which there were brought together, to work for a common result, not only a number of architects, but also the practitioners of the allied arts. The lessons learned were important: the inestimable value of coherence and classic orderliness; the individual freedom given those who accept a common restraint; greatest of all perhaps, the meaning of collaboration: That the architect, the painter, the sculptor, if each is to

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[165] "Circular of Information," Department of Architecture, Beaux-Arts Institute of Design, 1928-1929, 2, Department of Architecture Archives Collection, Box 7, 15/1/512, Cornell Archives; and *Proceedings of the Sixtieth Annual Convention of the American Institute of Architects* (Washington, D.C.: Board of Directors of the American Institute of Architects, 1927), 25; and Frederick L. Ackerman, "On the Relation of Art to Education," *AIA Journal*, vol. 4, no. 11 (November 1916), 455. As Anthony Alofsin notes, the collaborative pedagogical strategy of the École des Beaux-Arts served as William Ware's model in formulating two of the earliest university-level architectural programs at MIT (1868) and Columbia (1881). Other early programs were at the University of Illinois at Urbana-Champaign (1870), Cornell University (1871), Syracuse University (1873), Pratt Institute (1888), University of Pennsylvania (1890), and the Armour Institute (1893). Alofsin dates the collaborative program at Harvard to the turn of the twentieth-century, when the architecture and landscape architecture programs "shared a single curriculum, faculty, and resources, with specialized courses required of each field." (Anthony Alofsin, *The Struggle for Modernism: Architecture, Landscape Architecture, and City Planning at Harvard* (New York and London: W.W. Norton & Company, 2002), 23). Ackerman, a 1901 graduate of Cornell University and former partner from 1906 to 1920 of Samuel Trowbridge, re-surfaces in the next chapter as a colleague of Robert D. Kohn ("Biographical Notes, Frederick L. Ackerman," New York City Housing Authority Collection, La Guardia and Wagner Archives, La Guardia Community College/The City University of New York). For more on Ackerman and the influence of Thorstein Veblen, see Paul Emmons, "Diagrammatic Practices: The Office of Frederick L. Ackerman and *Architectural Graphic Standards*," *JSAH*, vol. 64, no. 1 (2005), 4-21; and Hyungmin Pai, *The Portfolio and the Diagram: Architecture, Discourse, and Modernity in America* (Cambridge, MA: The MIT Press, 2002).

[166] Ackerman, "On the Relation," 455.

[167] La Farge, "A Glimpse," 253; and Hyungmin Pai, *The Portfolio and the Diagram: Architecture, Discourse, and Modernity in America* (Cambridge, MA: The MIT Press, 2002), 97.

[168] Ibid.

> reach his highest expression, must work all together, mind to mind and hand to hand, not as separate units fortuitously assembled, but as an intimately interwoven and mutually comprehending team – as men worked in every great age of the past to make great works of art.[169]

Collaboration, Authority, and Authorship

This idealization of collaboration -- modeled on the perfect unity of purpose and physical form attributed to the Renaissance when artist and architect were frequently as one -- was the hallmark of the historicist agenda of collaboration advanced by La Farge and colleagues. Collaboration in this context was not a rationalized methodology of problem-solving amongst diverse individuals, nor was it a means of erasing cultural or professional boundaries. Rather, it was specifically the assemblage of like-minded men inspired to re-capture what they believed had been lost over time: the physical integration of architecture and allied arts. Beyond a defensive maneuver against modernism, it was an iteration of collaboration intended to remedy the "degeneration" they perceived had befallen art and architecture since the Renaissance.[170]

Yet, despite the intimacy suggested by its roots in the camaraderie of social and professional clubs, this was not a collaboration of equals. Consistent with parallel efforts by the AIA and others in the architectural community to portray the architect as the patron's trusted advisor, La Farge promoted architecture as the "outcome of all the arts of design joined together," thus elevating architecture to a higher plane than that of its sister arts.[171] While this bore some similarity to early writings on collaboration by Van Rensselaer and others, in the La Farge interpretation, architect and artist worked synchronously under the architect's leadership to create a seemingly harmonious result, with 'authorship' of the completed work attributed to the architect.[172] Indeed, La Farge readily acknowledged that architecture, to be a "triumphant record of a mighty people . . . such as past days have seen," is not produced by the architect in isolation, and that architects who fail to learn how to work with artists "may be at best barren performers."[173] At the 1911 AIA national convention, he spoke compellingly of the craftsman as "our brother and dependence, without whom . . . we are but theoretical designers, so that it is our duty to ourselves and to the art we profess to go hand in hand with him toward our common goal."[174] Yet he was quick to clarify that "the conceptions of the architect, expressed by his drawings and his directions; the guidance of his skill and his experience, the influence of his

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[169] La Farge, "The American Academy," 53-54.

[170] "Art at Home and Abroad," *The New York Times*, 31 January 1909, x6.

[171] At the 1909 AIA convention, for instance, Cass Gilbert spoke of the need to "conduct our affairs so that we will deserve confidence and respect." He protested contractors usurping the responsibilities of the architect by including architects under their general contract with the owner. An advisory from the AIA issued at the convention proffered the notion of the architect as an independent arbiter "of the highest integrity, business capacity, and artistic ability" between the owner and the contractor, and that payment from the owner did not influence this vital role. ("Convention of the American Institute of Architects held at Washington D.C. Dec 14, 15 and 16," *AABN*, vol. 96, no. 1774 (22 December 1909), 272.

[172] Indeed, until the turn of the twentieth century Architectural League competitions presumed the architect as "dominating collaborator," with the painter and sculptor "forced into harmony with his scheme" "Art at Home and Abroad," *The New York Times*, 31 January 1909, x6.

[173] C. Grant La Farge, "Education," *AIA Journal*, vol. 3, no. 3 (March 1915), 119.

[174] "Banquet Tendered by the San Francisco Chapter to the Visiting Delegates," *AABN,* vol. 99, no. 1833 (8 February 1911), 8.

energy, his diplomacy and his judgment" were critical attributes of the architect as leader and 'author' of the collaboration.[175] This set the stage for the architect, ostensibly by virtue of his professional training and stature, to not merely participate in but specifically to lead the collaboration, a position Gropius would later adopt in his Bauhaus proclamations from 1919 onward.

La Farge's stance on the architect as the leader of collaborative undertakings differs from his own experience during the First World War at the United States Housing Corporation, an immense organization charged with providing homes for munitions workers.[176] As assistant general manager, he witnessed first hand new management strategies intend to grapple with the enormity of the corporation's mission.[177] The assemblage of vast numbers of private practitioners as "one great collaborative unit" called to mind the architects and artists gathered for the Chicago Exposition, but in this instance La Farge encountered a considerably more diverse array of talents and expertise -- engineering, planning, architecture, economics -- brought to bear on the development of vast housing communities.[178] The organization, as La Farge recalled,

> functioned as what may fairly and appropriately be called a Team. In so doing there has been afforded illuminating evidence of its factors and of the value of so uniting them when the problem of industrial housing, whether for war workers, or those of peace, is to be adequately solved in its many economic and social aspects." [179]

These teamwork arrangements intrigued La Farge, and he acknowledged "the possibility and the value" of such collaboration premised on service to the government in time of need.[180] For "private enterprises, and in the common run of things," however, La Farge insisted that "no

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[175] La Farge, "Education," 119.

[176] La Farge is listed as one of two "assistant general managers" of the United States Housing Corporation, a component of the Federal Bureau of Industrial Housing and Transportation operating under the auspices of the Secretary of Labor (Otto M. Eidlitz, Director, *Report of the United States Housing Corporation, December 3, 1918* (Washington, D.C.: Government Printing Office, 1919), 25; and "The United States Housing Corporation of the Department of Labor During the War," *AIA Journal*, vol. 7, no. 2 (February 1919), 59).

[177] C. Grant La Farge, "Regional Surveys – Their Aim and Importance in War and Peace," an address before the Home Registration Service Committee of the State Council of Defense, August 5, 1918, at Chicago, as published in *AIA Journal* (January 1918), 402-403). Under the auspices of the Bureau of Yards and Docks of the Department of the Navy, La Farge also had a minor role in a wartime hospital building program that led to the construction of some five hundred hospitals scattered across the country "On account of the fact that plans and specifications for several hospitals had to be prepared simultaneously, and on account of the limited number of draftsmen available at the bureau, it became necessary to obtain the services of several architects to prepare drawings and specifications under the direction of the bureau. Appreciation is expressed…for the work of Mr. C. Grant La Farge at Brooklyn, N.Y." (*Activities of the Bureau of Yards and Docks*, *Navy Department, World War 1917-1918* (Washington, D.C.: Government Printing Office, 1921), 103. La Farge remained active in housing after the war, joining noted activists Clarence Stein and Robert D. Kohn -- one of the protagonists in the next chapter -- on a 1920 competition committee sponsored by the New York State Reconstruction Commission targeting eradication of slums in New York City. On the opposite end of the spectrum, La Farge, Kohn, and Magonigle joined again that year on the Architectural Harmony Committee of the Fifth Avenue Association in New York City to award the "best new buildings and alterations in the Fifth Avenue section." "Prizes for Fifth Avenue Buildings," *AABN*, vol. 118, no. 2327 (28 July 1920), 115; and "Prizes for Buildings," *The New York Times* (9 November 1920), 32).

[178] C. Grant La Farge, "Education Toward Reality," *AIA Journal* (January 1919), 247.

[179] C. Grant La Farge, "Government Housing; What Will Follow?" *AABN* vol. 115, no. 2246 (8 January 1919), 58.

[180] La Farge, "Education Toward Reality," 248.

such uniting of the forces may be anticipated." [181] Indeed, in his extensive writings and lectures he remained adamant about collaboration as a decidedly historicist endeavor amongst architects and artists, to the exclusion of other occupations. This exclusivity reinforced for La Farge an idealized architecture/art bond dating to antiquity since transformed by industrialization and specialist tendencies. It was, furthermore, a paradigm that ostensibly safeguarded the primacy of architectural authority in the collaborative relationship, while paradoxically promoting architecture as one of a collection of sister arts. Edwin Blashfield (1848-1936), a fellow Century Club member, Academy founder, and noted muralist who worked under La Farge's direction on mosaic decoration above the altar at St. Matthew's Cathedral in Washington, D.C., echoed this sentiment when he likened the architect to the "commander-in-chief" who "from the moment that he designs his building, his staff should be at his side, awaiting orders . . . sculptor and painter at his elbow should be ready." [182] Another La Farge colleague, sculptor John Gregory, reiterated this point when referring to the "perfect expression of its practitioners in collaboration under the leadership of the architect." [183] Cortissoz, who penned the introduction to a monograph on Blashfield, in speaking of collaboration observed quite simply that the architect is "the crux of the whole affair," while advising that "the first element in collaboration consists of meeting the artist half way, comprehending him but not attempting to guide him, accompanying him on his task not only with penetrating sympathy but with a constant play of intelligence." [184]

By its exclusivity, La Farge's iteration of collaboration relegated other occupations -- most notably the engineer -- to a marginal position in an era when there was no single normative working relationship between architects and engineers or any of the specialists arising in the building industry. This situation led not only to stiff competition within overlapping realms of expertise, it contributed as well to a confusing array of contractual arrangements.[185] C. T. Purdy, a noted engineer and specialist on steel construction, reported to the AIA in 1904 that building patrons faced a daunting choice of relationships amongst architect, engineer, builder, and

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[181] La Farge, "Government Housing," 58.

[182] Blashfield, "Considerations on Mural Painting," 85; *Brochure of the Mural Painters, A National Society*, New York: The Mural Painters, A National Society (1916), 68; and Sarah J. Moore, "In Search of an American Iconography: Critical Reaction to the Murals at the Library of Congress, *Winterthur Portfolio*, vol. 25, no. 4. (Winter 1990), 232-234. "Royal Cortissoz . . . wrote a series of articles on the decorative work in progress at the Library of Congress. He shared with other critics . . . a concern about the architectural armature of mural painting and listed organic unity and essential harmony between architecture and decoration as criteria for the value and success of mural painting. While this commitment to the inherently decorative quality of mural painting did not dictate the content or the themes of murals per se, it did require muralists to adapt their forms to the architectural surroundings. Like Blashfield, Cortissoz considered mural painting a vehicle of cultural and national expression, yet he maintained that an articulation of nationalism was not the sole prerogative of such cosmopolitan universalists as Cox or Blashfield" (Moore, 234-235).

[183] "Collaboration and the Sculptor, Address of John Gregory," *Proceedings of the Sixtieth Annual Convention of the American Institute of Architects* (Washington, D.C.: Board of Directors of the American Institute of Architects, 1927), 19.

[184] Cortissoz, "The Art of Collaboration," 183; Royal Cortissoz, "Introduction," in Edwin Howland Blashfield, *The Works of Edwin Howland Blashfield* (New York: Charles Scribner's Sons, 1937); and Royal Cortissoz, "On Clients and Medusas," *The Architectural Forum*, vol. 53, no. 4 (October 1930), 444.

[185] "Architect and Engineer," *The New York Times* (29 June 1902), 8. For an in-depth discussion, see Saint, *Architect + Engineer*.

manufacturers.[186] He further suggested that the interests of the client were best served by "centralization of responsibility in one man" and graciously proffered the architect as better suited for this "position of supreme control" by way of "precedent" and breadth of responsibility over the equally talented but more narrowly focused engineer.[187]

La Farge was less nuanced when speaking of a divergence between the "science and art" of architecture and the technicality of engineering, a divergence dating to the mid-eighteenth century founding of the *École des Ponts et Chaussees* in Paris, and subsequently fueled by the proliferation of iron as a building material requiring increasing expertise to master its potential.[188] La Farge reasoned that since the architect shouldered full responsibility for the physical beauty of a building -- a beauty derived from the harmony of its constituent parts and the unifying forces of tradition -- then the engineer, specialized as he was in but one constituent part, could play only a supportive, albeit valuable, role in the design process. Moreover, he argued, in a highly competitive marketplace in which distinctions between the architect and engineer remained unclear, architects could not rely upon collaboration with the engineer -- the "tribal enemy" -- only "feeling him…to be in the designing of appearance a barbarian, and in group-planning a joke, but seeing him, nevertheless, get away with the goods." [189]

La Farge confessed he could offer no strategy to resolve this "long-standing difference" between architects and engineers.[190] It might be eased, he suggested, by incorporating some aspects of the engineer's training into architectural education, but overexposure to the engineering specialty, he feared, would detract from preparing the architect to "coördinate, understand, criticize and control many specialists." [191] He was nonetheless impressed with what he perceived to be a certain unity of engineering and constructional technique driven by a "direct, sure, competent, orderly habit of mind." [192] Yet, he resisted the inclusion of engineers in his circle of collaboration, preferring to co-opt the qualities he admired about the engineer into the training of architects specifically so they might defend their jurisdictional space against intrusion. "And when he has it," La Farge argued on behalf of architects, "

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[186] C. T. Purdy, "The Relation of the Engineer to the Architect," *Proceedings of the Thirty-eighth Annual Convention of the American Institute of Architects* (Washington, D.C.: Board of Directors of the American Institute of Architects, 1904), 124-125. This was, Purdy argued, an "undesirable condition of affairs" attributable to inconsistencies in architectural training, cost-cutting motivations by clients and practitioners alike, and a resistance amongst architects to outsourcing portions of the design responsibility. For further commentary on the Purdy address, see "Relation of the Engineer to the Architect," *Carpentry and Buildings, vol. 27* (August 1905), 204-206.

[187] Purdy, 131. By contrast, in an article on steel construction, engineer John M. Ewen contrasted the efficiency and precision of the "modern compact engineering force" with the "scattered individuals who used to collaborate" in building construction. In playing down the efficacy of collaboration, he linked engineering with rationality and science while downplaying the artistic bent of architecture. (John M. Ewen, "Modern Steel Buildings," *AABN*, vol. 92, no. 1663 (9 November 1907), 147).

[188] La Farge, "Education Toward Reality," 248. This separation, as other scholars have discussed, flows from the Renaissance-era notion of *disegno* embodied by Vasari in his *Lives of the Artists* to distinguish between architectural conception and production. This nuanced distinction became more pronounced over time as indelible professional boundaries arose between architecture and construction. On this topic, see Saint's *Architect + Engineer* (15); Catherine Wilkinson, "The New Professionalism in the Renaissance," in Kostof (134-136); and James Ackerman, "Alberti's Light," in Ackerman, *Distance Points* (81).

[189] Ibid., 246.

[190] Ibid., 248.

[191] Ibid.

[192] Ibid., 249.

> we may look forward with some confidence to his entirely holding his own against the encroachments now distressing us, for he will be so much bigger and better and stronger than those whose successful invasion today is founded upon the assumption of an efficiency they do not fully possess, for they are too narrowly trained, too ignorant of the greater principles that real architecture includes and is founded upon.[193]

While La Farge's was a pervasive paradigm, it was by no means universally-held. Amidst charges and counter-charges -- engineers belittling architects for insufficient technical proficiency owing to the rise of iron building methodologies; architects charging the engineer with a lack of artistic sensibility -- some notable observers of the profession chose instead to invest in collaboration aspirations for improving relations between the competing professions. Representative of this position was architectural historian A. E. Richardson -- Rudolf Wittkower cited him as the "master" on Georgian architecture -- who, in a 1921 lecture, urged architects and engineers to find common ground, lamenting that they "seldom collaborate and until this misunderstanding of the functions of each is overcome no real progress will be made." [194] Such tensions were perhaps most evident in bridge-building, long a site of contention engaged with high-stakes political maneuvering. As early as 1896, Salem H. Wales, a founding trustee of the Metropolitan Museum of Art and a New York City bridge commissioner, called for architect/engineer "collaboration" on the new East River span to offset the tendency to assign American bridge-building to engineers with "little or no artistic ability." [195] In 1915, John J. Klaber promoted "intelligent collaboration" of architects and engineers, noting that stone bridges -- "generally a collaboration between engineer and architect" -- are of greater artistic merit than their iron counterparts, which tend to be by engineers with "little or no training in the treatment of aesthetic problems." [196] Three years later, architect Paul Philippe Cret and engineer Ralph Modjeski reluctantly agreed to an "intelligent and tactful collaboration" on the new Delaware River Bridge to mediate a highly publicized and politicized jurisdictional battle between the architectural and engineering communities.[197]

Codification of Collaboration

What most distinguishes La Farge's collaboration from these more inclusive iterations of his contemporaries, however, was a methodical effort to secure its codification in architectural practice. Interestingly, the professional and political authority for this codification was readily

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[193] Ibid.

[194] Rudolf Wittkower, review of A. E. Richardson, *An Introduction to Georgian Architecture* (London: Art and Technics, 1949), in *The Burlington Magazine*, vol. 92, no. 572 (November 1950), 331-332; and A. E. Richardson, "Architectural Engineering," *AABN and the Architectural Review*, vol. 120, no. 2383 (21 December 1921), 489.

[195] "The Artistic Element in Engineering Works," *Scientific American*, vol. 75, no. 3 (18 July 1896), 34.

[196] John J. Klaber, "Suggestions for the Artistic Treatment of Iron Bridges," *AABN*, vol. 107, no. 2059 (June 9, 1915), 357. Architect and author Frank A. Bourne similarly argued that since engineers concern themselves exclusively with structural economy, "the collaboration of architect and engineer . . . will bring these structures a beauty of line not heretofore attained in the majority of American bridges." Frank A. Bourne, "Department of Architectural Engineering, The Architect a Necessary Factor in Bridge Building," *AABN*, vol. 118, no. 2330 (18 August 1920), 221.

[197] Harold Donaldson Eberlein, "The Delaware River Bridge between Philadelphia and Camden." *Architectural Record,* vol. 61 (1927), 1-12, as summarized in Jonathan E. Farnham, "Staging the Tragedy of Time: Paul Cret and the Delaware River Bridge," *JSAH*, vol. 57, no. 3 (September 1998), 263.

accessible to La Farge through his clubbing activities, for it was common in this era for architects and artists to enjoy the camaraderie of wealthy patrons and public figures in their social clubs and shared-interest societies.[198] As Gardner notes, Van Rensselaer succinctly captures this aspect of clubbing in her 1887 depiction of the client/architect relationship as so "intimate" that is difficult to discern "if the former sometimes chooses his executive chiefly for the reason that he is a friend or relative or that although a stranger, he belongs to the same social stratum as himself." [199]

Van Rensselaer's general musings on the topic could just as well have been written about the specific relationship La Farge enjoyed with Theodore Roosevelt.[200] Founded upon a shared passion for the outdoors manifested through the Boone and Crockett Club, a men's organization founded by Roosevelt in 1887 to "promote manly sport with the rifle . . . and to work for game and forest preservation by the State," the relationship took on a quasi-professional character when Roosevelt encouraged La Farge to undertake a critical role in the founding and development of the New York Zoological Park, and then again in 1905 when La Farge designed an addition to Roosevelt's Sagamore Hill summer residence.[201] In 1909, after elevation to the

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[198] In his discussion of professional authority, Abbott notes that "some professions invoke state assistance in competition, usually under the rhetoric of putting down dangerous quacks or of a creating a seriously disciplined professional body. Others co-opt institutions of the upper classes . . . to provide money, publicity, and legitimacy with which to pursue a competition. This certainly was the strategy of the psychiatrists in the 1910s and 1920s who parlayed the money of the Commonwealth Fund and the Rockefeller Foundation into a serious invasion of the various social-control jurisdictions." Abbott continues: "A final means for drawing power . . . is alliance with a particular social class, a strategy usually pursued by elite professions. In such a case, a profession draws both its recruits and its clients from the upper classes, locates its training in elite universities or similar settings, and affects an ethic of stringent gentlemanliness." (Abbott, 137).

[199] Mrs. Schuyler Van Rensselaer, "Architecture as a Profession," *The Chautauquan*, vol. 7 (April 1887), 453, as cited in Gardner, 99.

[200] In a 1919 obituary on Roosevelt, initiated in 1909 as an honorary member of the American Institute of Architects, La Farge wrote: "Whether to work or to play with him was to be swept upon the strong current of his indomitable energy into regions where old things wore new aspects, where the horizons of one's world were extended, was to feel one's sluggishness and inertia, one's timidities and above all, one's selfishness, to be shameful." (C. Grant La Farge, "Obituary: Theodore Roosevelt," *AIA Journal*, vol. 7, no. 2 (February 1919), 60).

[201] Theodore Roosevelt and George Bird Grinnell, "The Boone and Crockett Club," in Theodore Roosevelt and George Bird Grinnell, eds., *American Big-Game Hunting: The Book of the Boone and Crockett Club* (New York: Forest and Stream Publishing Company, 1893), 10; Theodore Roosevelt, "The Whitetail Deer," in *Outdoor Pastimes of An American Hunter* (New York: Charles Scribner's Sons (1905),197; and Baker, et. al. *Long Island Country Houses*, 240. Membership in the Boone and Crockett club, which looms large in accounts of the American conservation movement, included an elite group of one hundred men whose wealth, status, and prowess at hunting 'big-game' made them eligible for membership. ("The Week in Club World," *The New York Times* (January 2, 1898), page unknown). In 1895, Roosevelt tapped La Farge along with future Senator and Nobel peace prize recipient Elihu Root and eugenicist attorney Madison Grant to lobby the State Legislature for a charter to develop a zoological park "for the instruction and recreation of the people." ("New York Zoölogical Society," *Forest and Stream: A Journal of Outdoor Life, Travel, Nature Study, Shooting*... vol. XLVL, no. 22 (30 May 1896), 434; *Sixth Annual Report of the New York Zoological Society*, New York: Office of the Society (1902), 160-161; and "Dr. Hornaday's Retirement as Director of the New York Zoological Park," *The Scientific Monthly*, vol. 23, no. 1 (July 1926), 88). La Farge also co-authored with Andrew H. Green and Henry F. Osborn a "Preliminary Plan for the Prosecution of the Work of the New York Zoological Society, leading to the selection and acquisition of land for the park. (William K. Gregory, *Biographical Memoir of Henry Fairfield Osborn*, 1857-1935, Washington, D.C.: National Academy of Sciences of the United States of America Biographical Memoirs, vol. 19, third memoir (1935), 80). Clive Aslet cites Roosevelt's letter to La Farge commenting favorably on his design for the North Room of the Sagamore Hill residence: "Really, I like it better than any room in the White House, which as you know is my standard of splendor." (Clive Aslet, *The American Country House*, New Haven: Yale University Press (1990), 179.

presidency upon William McKinley's death, Roosevelt once again turned to La Farge, along with Architectural League and Academy colleagues Cox, Turner, and Blashfield, for appointment to a Council of Fine Arts comprised of thirty architects, painters, sculptors and landscape architects to "advise upon the character and design of all monuments, parks, bridges and other works of art of which the art of design forms an integral part." [202] The Council arose out of concern amongst the historicist wing of the profession that the Federal government, as the patron of a vast portfolio of buildings, had squandered millions in a seemingly "haphazard" fashion. Its members aspired for the Council to stand as a temporary mechanism until formation of a Bureau of Fine Arts to officially administer all government building as part of a sweeping plan to further a Beaux-Arts iteration of state-sanctioned architecture.[203] Much to their dismay, however, Warren H. Taft subsequently nullified Roosevelt's executive order authorizing the Council, ostensibly on the technicality that he believed such appointments were the purview of Congress, not the executive branch.[204] Not given easily to surrender, La Farge and William Emerson on behalf of the AIA renewed their efforts along these lines in 1917, calling for a commission to "formulate and recommend the wisest public building policy." [205] A national policy on architecture, La Farge insisted

> would confer manifold blessings. Its value and usefulness to the nation would be reflected upon the public buildings of our States, our cities, and our towns. As a nation we compare most unfavorably with all others in the methods by which we approach such undertakings. [206]

In the years leading up to the First World War -- roughly the period he was in partnership with Morris on commissions for the Astor and Morgan families -- La Farge intensified his participation in civic and professional affairs with a keen eye on promoting the historicist agenda

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[202] "Current News," *AABN*, vol. 95, no. 1727 (27 January 1909), A31; and "The Government and Art," *Outlook* (6 February 1909), 285. Other architects appointed to the Council included Cass Gilbert, George B. Post, Arnold Brunner, Breck Trowbridge, Daniel Burnham, and Charles McKim. John La Farge and sculptors Daniel C. French, Herman Adams, and H. A. McNeil rounded out the artists, and Frederick Law Olmsted, Jr. was the sole landscape architect. Also in 1909, many of these appointees (La Farge, Brunner, Trowbridge, and Post) sat together with Senator Newlands and New York City Mayor McClellan at the 24th annual Architectural League exhibition. At this same meeting, John La Farge was the recipient of a medal for mural painting presented by his son (Twentieth-fourth Annual Exhibition, Architectural League of New York," *AABN* (10 February 1909), 41). See also a discussion of John La Farge's controversial remarks upon receiving the award in Yarnell, "Brilliant but Stormy Collaborations," 34.

[203] "The Government and Art," 91.

[204] "Convention of the American Institute of Architects" (22 December 1909), 272; and "Report of the Committee of the AIA on the Bureau of Fine Arts," *AABN*, vol. 96, no. 1775 (29 December 1909), 282. In his support of the Bureau, Gilbert called upon architects not to neglect architecture as an art. "Scholarship, intellectual achievement, scientific research, and, above all, the art of design are, and always will be, of the first importance to this organization" ("Convention," 272).

[205] C. Grant La Farge and William Emerson as cited in "A Sound Public Buildings Policy for the Government," *AABN* vol. 111, no. 2145 (31 January 1917), 73.

[206] Ibid. In a similar nationalist fervor, La Farge noted in 1915 that unlike France, where there is official state support for its academy in Rome, "[w]e in America do not do things in this way; we have no Ministry of Fine Arts, nor any equivalent. When we want an academy, we must as our citizens to put their hands into their pockets and give the funds for its establishment and maintenance; for though our government gives us a charter, it does not, and may not be expected to, give financial support. . . Hence the property held in Rome by the trustees, and the educational opportunities there offered, truly belong to America, and those who have given to the Academy have given to our country" (C. Grant La Farge, "The American Academy," 53).

of collaboration. In 1910, a year after elevation to Fellow of the AIA, he was amongst newly elected directors -- including assistant Secretary of the Treasury Charles D. Norton -- attending the inaugural convention of the American Federation of Arts, a consortium of institutional and educational programs committed to unleashing the potential of American art previously confined to a realm of exclusivity for public benefit. [207] That same year, he served on the national AIA Standing Committee on Competitions and chaired another committee charged with formulating the president's address to the AIA annual gathering. [208] In 1912, he was amongst a group of "prominent New Yorkers" urging support of a new post office for the City of New York before a U.S. Senate sub-committee, participated in the AIA effort against repealing the Tarney Act -- a fifteen-year regulation allowing private sector architects access to public sector commissions -- and reported on behalf of the AIA to a State of New York commission investigating health and safety conditions for factory workers. [209]

This extensive professional and civic activity earned La Farge a directorship of the AIA in 1912, followed by a committee chair on civic improvements and presidency of its New York chapter. [210] He worked with Mayor Gaynor, the presidents of three New York City boroughs, and representatives of prominent real estate, builder, and merchant associations investigating possible regulations concerning the "height, size, and arrangement" of new structures.[211] Several years later, La Farge was amongst a group of "leading citizens" called upon by John Purroy

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[207] Robert W. de Forest, "To Make Art Free for Democracy: The Peace Program of the American Federation of Arts," *Bulletin of the Metropolitan Museum of Art*, vol. 14, no. 5 (May 1919), 102. The first AFA convention reflected the fusion of art and architecture in the AFA membership, exemplified by Arnold W. Brunner, president of New York chapter of the AIA, Blashfield representing the National Academy of Design, Hermon A. MacNeill of the National Sculpture Society, William Laurel Harris for the National Society of Mural Painters, and Professor Everett of the University of Pennsylvania. Presenters at the convention included Cram speaking on the relation of "Architecture to the People," Mitchell Carroll, secretary of the Archaeological Institute and leading force behind the journal *Art and Archaeology*, on "archaeology as a force to counteract vulgarity," and Blashfield holding forth on the "Ethics and Politics of Mural Painting." ("Convention of the American Federation of Arts," *AABN*, vol. 97, no. 1798 (8 June 1910), 222).

[208] La Farge served on the Standing Committee on Competitions with Frank Miles Day, architect and critic R. Clipston Sturgis, and AIA president Irving K. Pond ("Report of Standing Committee on Competitions," *AABN*, vol. 100, no. 1878 (20 December 1911), 6. La Farge was on the committee again in 1913, along with Robert D. Kohn and Milton B. Medary as chairman, when it issued an extensive guidelines cautioning that competitions should not be a predominant element in normative architectural practice but are appropriately employed to overcome the monopolization of public work by political appointees. ("Report of the Standing Committee on Competitions," *AABN*, vol. 104, no. 1983 (24 December 1913), 251.) Regarding the address of the AIA president, see "Summary of Second Day's Proceedings; Forty-fourth Annual Convention, American Institute of Architects, San Francisco, Cal, January 18, 1911," *AABN*, vol. 99, no. 1832 (1 February 1911), 3.

[209] In support of the new post office, La Farge accompanied by H. van Buren Magonigle, Egerton Swarthout, and Otis Post ("Gaynor Makes Plea for New Post Office," *The New York Times* (30 May `1912), 6. On health and safety conditions, La Farge joined with Lansing C. Holden, Ernest Flagg, Julius Franke, Henry Atterbury Smith, and H. Van Buren Magonigle ("Report of a Special Committee of the American Institute of Architects on the Repeal of the Tarnsey Act," *AABN*, vol. 102, no. 1919 (2 October 1912), 117; and *Preliminary Report of the Factory Investigating Commission, 1912*, *vol. 3*, (Albany: The Argus Company Printers, 1912), 1532.

[210] "Current News and Comment," *AABN*, vol. 102, no. 1931 (25 December 1912), 5; and Florence N. Levy, ed., *American Art Annual, vol. 11* (New York: American Federation of Arts, 1914), 249. The elected officers included Walter Cook as president, R. Clipston Sturgis as first vice-president, Frank C Baldwin as second vice-president, Glenn Brown as secretary/treasurer, and Burt L. Fenner, C. Grant La Farge, and HVB Magonigle as directors.

[211] "To Regulate Height of Buildings," *Wall Street Journal*, April 26, 1913, 6; and *Commission on Districts and Restriction, Final Report, June 2, 1916* (New York: Board of Estimate and Apportionment, Committee on the City Plan, 1916), 3.

Mitchel -- the "Boy Mayor" of New York City -- to plan a celebratory event marking completion of the Catskill water supply aqueduct, and in 1917 he sat on the supervisory board of *The American Yearbook*, a "vast compendium of human endeavor in the twentieth century" edited by Francis G. Wickware. [212] This role as a public face of the architectural profession -- a role he maintained until his death in 1938 -- earned La Farge a host of public and professional accolades.[213] In 1915, the editors of a biographical survey by *The Brickbuilder* identified La Farge as a prominent American architect, observing that his "high ideals, imaginative vision, and deep sense of responsibility in all he undertakes render him one of the most useful members of the profession to-day." [214] In 1925, *The New York Times* listed La Farge as one of seventeen "leading architects, sculptors, and designers of the country" under consideration to design a memorial to Theodore Roosevelt contemplated for the tidal basins of the Potomac River, an elite list that included Pope, McKim, Mead and White, Delano and Aldrich, John Gregory, H. A. McNeil, and Ferruccio Vitale.[215]

His political connections and professional stature left La Farge well-positioned to pursue a critical component of the historicist agenda: codification of collaboration by the AIA. This was the ultimate mark of approval for La Farge and his historicist colleagues, for the AIA had by the early twentieth century not only accumulated influence amongst architects, the government, and the public on matters of building codes and standardization of practice, it had become a moral compass for the profession. As Irving K. Pond reported to the 1911 AIA convention -- La Farge chaired the committee responsible for the speech -- the "high standing and wide authority" of the

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[212] *Documents of the Assembly of the State of New York, 141st Session, 1918, vol. 29, no. 62* (Albany, NY: J. B. Lyon Company, Printers, 1918), 809; and Francis G. Wickware, ed., *The American Yearbook: A Record of Events and Progress, 1917* (New York and London: D. Appleton and Company, 1918), xiii.

[213] His later well-publicized activities included railing against "intrusion" by the federal government into the realm of private practice by way of the New Deal-era Public Works Administration, participation on a Charity Organization committee comprised of luminaries such as Mrs. John D. Rockefeller 3rd to argue for increased funding for slum removal in New York City, and various outreach committees of the New York chapter of the AIA. ("Architects Hit Intrusion," *The New York Times* (May 20, 1934), 12; "New Drive Opened to Get Rid of Slums," *The New York Times* (2 August 1936), N2; and "Many Architects Names," *The New York Times* (27 February 1938), 186). In 1921, he was amongst an elite group speakers invited to the Columbia University School of Architecture over the course of the academic year, along with Cass Gilbert ("Advice to Young Architects on Building up a Practice"), Robert D. Kohn ("Getting Along with the Contractor"), Magonigle ("The Young Practitioner: His Relation to the World"), and Frederick L. Ackerman ("The Duty of an Architect as an American Citizen"). *Annual Report of the President and Treasurer to the Trustees, with accompanying documents for the year ending June 30, 1921* (New York: Columbia University Bulletin of Information, 1921), 139.

[214] "Brief Sketches," 261. At a ceremony in 1921 to award him an honorary Masters of Fine Arts from Princeton University, Dean West gushingly portrayed La Farge as an "artist of constructive originality, with brilliant and versatile gifts, tempered by sound historical judgments; designer of impressive civil, domestic, academic, and ecclesiastical structures; the incisive critic to whom his fellow-artists gladly come for searching review of their plans, widely read in literature, a writer of vivid and graceful style, a lover of outdoors – at home on swift water or in the winds, a living impulse in the American Academy in Rome, a humanist ardently devoted to the cause of arts and letters of the ennobling of American life." ("Grant La Farge Honored by Princeton," *AABN*, vol. 120, no. 2374 (17 August 1921), 136).

[215] "Roosevelt Shaft Plan Submitted," *The New York Times* (13 December 1925), 6.

association was attributable in great measure to its selectivity on membership.[216] This suggests that AIA membership was neither incidental nor assured for the mass of architectural practitioners, rather a reward for moral caliber, professional honor, and dignity. As Thomas Haskell puts it, professional associations such as the AIA in this period were a "way to insure that each audience would find its proper guide; that moral and intellectual authority would be possessed only by those who deserved it."[217]

As chair of the Committee on the Allied Arts, La Farge successfully lobbied the Institute to adopt collaboration as the principal theme of its 1927 annual convention.[218] In the lead-up to the convention, the New York chapter of the AIA sponsored twice-monthly tours of craftsman shops and foundries for architectural draftsmen as a "simple, direct experiment in collaboration," with the rationalized objective of reducing costly drawing errors "due to a lack of knowledge of the crafts."[219] More significantly, collaboration was the focus of a series of articles in most of the principal professional journals shortly before a general editorial shift amongst these same journals toward matters of practice over aesthetic considerations.[220] Sculptor Alvin Meyer wrote of a renewed interest in collaboration amongst architect, painter, and sculptor, though he acknowledged the challenges of translating such theory into practice given tendencies toward cost cutting and conflicting stylistic expressions.[221] Edgar I. Williams' piece in *Pencil Points* promoted collaboration as a counterpoint to increasing specialization and individualistic behavior amongst artists, while Cortissoz channeled the spirit of Brander Matthews to craft his article on "The Art of Collaboration."[222]

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[216] According to Pond, this accounted for "less than one-fifth of the number of so-called practising architects in the United States." The AIA, Pond noted, "would gladly welcome to its fold every high-minded practitioner of the art of architecture. The Institute desires within its ranks no one who is not willing to make sacrifices for the good, not of the Institute, but of the profession. . . It is not the policy of the Institute to marry a man to reform him – the man must be formed and well formed when he presents himself. . . Not every man is born, Minerva-like, full-armored, but has to gain his equipment and ideals by increments through such avenues of experience and such educational agencies as may exist about him. Among these avenues and agencies are schools, ateliers, draughtsmen's club, architectural leagues, architects' business associations and the like, and the Institute encourages the formation and fosters the existence of such agencies, knowing well that they are developing men of moral fibre and professional strength who later will seek to associate themselves with the Institute body. ("Summary of Second Day's Proceedings," (1911), 5-6).

[217] Haskell, *The Emergence of Professional Social Science* (Urbana: University of Illinois Press, 1977), 52, as cited in Thomas Bender, "The Erosion of Public Culture: Cities, Discourses, and Professional Disciplines," in Haskell (1984), 97-98. See also Thornstein Veblen, *The Theory of the Leisure Class* (New York: Penguin Books,1979/1899), 15, in which he observes that "classifying and demarcating" are intrinsic to the mechanism of boundary formation between social groups based upon superiority, noting that the "concept of dignity, worth, or honor, as applied to persons or conduct, is of first-rate consequence in the development of class and class distinctions."

[218] La Farge noted: "In recommending that the energy and resources of the Institute be extended more vigorously into the field of collaboration the Board does not detract from the highly effective achievements of the Institute, in recent years, in scientific and structural service work. But it believes that the objects of the Institute will be served better if a like amount of enthusiasm and effort is devoted to architecture ad the allied arts -- thus making the national society of the architectural profession a well rounded and commanding force in the building industry" (*AIA Proceedings* (1927), 39).

[219] John Taylor Boyd, "Collaboration between Draftsmen and Craftsmen," *Architectural Record*, vol. 56, no. 3 (September 1927), 179.

[220] For a discussion of this paradigmatic shift amongst architectural journals, see Pai, Chapter 6, 143-159.

[221] Alvin Meyer, "The Sculptor Looks at Collaboration," *Pencil Points*, vol. 8 (1927), 669-674.

[222] Edgar I. Williams, "Architectural Collaboration," *Pencil Points*, vol. 8 (1927), 612-615; and Cortissoz, "The Art of Collaboration."

AIA president Milton B. Medary opened the convention held in Washington, D. C. in May 1927 by affirming that "truly great architecture" requires "a complete fusion of all the arts into a perfect harmony, each dependent upon the other, the whole inspired by the appropriate beauty each holds ready for the enrichment of every other and of the whole." [223] In his own address, La Farge expanded upon Medary's remarks, offering that while architecture had long been scrutinized and theorized as a science

> we shall now turn our attention to architecture as an art . . . in which all the arts of design are so interwoven, so interdependent, so essential, that unless their intimate relationship shall be clearly recognized and brought to fullness of realization, American architecture will not express the entire potentiality of American genius.[224]

Fulfillment of this potential, he argued, necessitated unified effort amongst the arts inspired by the "supreme collaboration" at the cathedrals in Chartres, Amiens, and Rheim. From these precedents architects might learn about collaboration, to "comprehend the simple significance of the word that means working together. Working together in that happy unison; that mutual helpfulness, that joyous fellowship, out of which beauty is born." [225] Yet, La Farge insisted, architects should be grateful for opportunities to "work with practitioners of the other arts of design," for it is "by their efforts, by their sympathetic comprehension of his needs and by their adequate solution of their portion of the problem, their own glory is past all measure enhanced." [226] As La Farge would assert later at the convention, the architect by his training and disposition was uniquely positioned to serve as the "leader in the assembling together of these contributing arts of design . . . bound to be the responsible person, he is bound to be the captain." [227]

One after another speakers at the convention reiterated La Farge's tripartite message: architecture as the assemblage of the arts; collaboration as the integration of architecture and the allied arts; and the architect as leader of the collaboration. Arthur Covery spoke of painting and sculpture as historically "subordinated to" and "children of the parent" architecture, a bond broken over time that he hoped might be restored through collaboration. Sculptor John Gregory referred quite explicitly to the "perfect expression" of collaboration "under the leadership of architecture." [228] "So many elements of grandeur and beauty are added to architecture every day," Gregory offered, "that a great vision is promised, a vision of coordinated artistic effort of gigantic proportions, a titanic collaboration extending from coast to coast." [229] Lorentz Kleiser spoke of his aspirations for a day when craftsmen might enjoy the fellowship of architects through collaboration, while Arthur Shurtleff argued for the inclusion of landscape architects as

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[223] This was a fusion premised on collaboration inspired by the great works of antiquity and characterized by "stimulation and cross-fertilization of all by the collective presence of a full orchestra of creative impulse." He proclaimed that the convention was but the initial step of a major undertaking by the Institute to promote collaboration in architectural practice and education, such that architects and artists might come "to know each other better, that each of us shall be enriched by that knowledge" (*AIA Proceedings* (1927), 7-8).

[224] *AIA Proceedings* (1927), 8.

[225] Ibid., 9.

[226] Ibid., 138.

[227] Ibid., 56

[228] Ibid., 20.

[229] "Predicts New Era of Design in Cities," *The New York Times* (12 May 1927), 20.

an allied art with architecture, promising on behalf of his profession's own society "the attainment of complete cooperation which has sometimes seemed an almost superhuman pursuit. . . a task to which we will whole-heartedly lend our strength." [230]

La Farge, appropriately, offered the capstone speech at the convention to succinctly capture the historicist paradigm of collaboration. It is worth quoting him at length:

We cannot very well understand what we mean by this term [collaboration] unless we first make up our minds as to what constitutes architecture. There can hardly be any dissent from the belief that architecture in its fullest meaning is inevitably the result of the uniting of many agencies. A completed building, even a modest one, includes more than one of these agencies, and a building may be, and often is, such as to include them all. There is the work of the architect himself. There is the work of the landscape architect who makes the setting in which the building stands. There is the work of the mural painter; of the sculptor. There are the innumerable adjuncts which come from the brain and hand of the craftsman. Undoubtedly it is the task of the architect to assemble all these different agencies in the utmost possible harmony. If he fails to do so; if his building is not the result of understanding, sympathetic, hearty, united effort of all the arts of design contributing to it, it certainly cannot reach the maximum of beauty as well as utility.[231]

Chapter Conclusion

The convention lasted but a few days but the impact of its orchestrated attention to collaboration had a discernible effect not seen since the Chicago Exposition, exemplified by considerable journalistic attention to collaboration during the subsequent year. [232] John Taylor Boyd wrote a piece on collaboration amongst draftsmen and craftsmen, while Everett Victor Meeks, dean of the School of Fine Arts at Yale, published two articles on collaboration in art education.[233] Everett Perry prepared an article on collaboration in the arts, portraying the Lee Lawrie sculptures at the new Los Angeles Public Library as so expertly executed with architect Bertram Grosvenor Goodhue that they appeared "grafted" as "a branch on to the architectural trunk." [234] Members of the AIA Committee on the Allied Arts, now chaired by J. Monroe Hewlett

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[230] *AIA Proceedings* (1927), 12. Holding out the Academy at Rome as the prototype for such "superhuman" activity, proponents of collaboration sought to engage the AIA in an effort to infuse the collaborative spirit into architectural programs. George B. McClellan argued there was no organization "better qualified than are you . . . to bring to the attention of our art schools this very vital matter. You have the influence because of your profession. You have the power to urge, to almost force the schools of art in this country to follow the example of the few and make them teach their students not only the possibilities but the necessity of collaboration" (133). "Our proposition," La Farge explained, "is that the Institute…should acquire full knowledge of existing conditions, and take such steps as may be practicable to bring about collaborative understanding and practice amongst he schools" (144). The success of such an endeavor, he noted, necessitated that artists be educated as to their proper role in architecture. The AIA, he argued, "must develop through education our painters, our sculptors, our landscapists and our craftsmen, to such a high degree of understanding of what their part of architecture is that complete and I trust some day universal collaboration will thereby be brought about" (138).

[231] *AIA Proceedings* (1927), 143.

[232] As convention attendees scattered across the country, one architect remarked: "One thing I got from the Convention, and that was collaboration. Collaboration! It was hammered into us again and again and again. I think that the idea went over." Boyd, 179.

[233] Ibid.; and Everett Victor Meeks, "Collaboration in Art Education," *AIA Journal*, vol. 16, no. 2 (February 1928), 45-53.

[234] Everett R. Perry, "The Lee Lawrie Scultpure of the Los Angeles Public Library," *AIA Journal*, vol. 16, no. 5 (May 1928), 169.

as La Farge's replacement due to failing health, drafted a program of principles to be shared with other professional organizations, "to bring about in the hearts and minds of those concerned a general understanding, a common acknowledgement of collaboration as a necessity and storing desire for working cooperation." [235] As incoming AIA president C. Herrick Hammond of Chicago reported:

The world in which we live is essentially a collaborative creation. We who are living in it find ourselves surrounded by conditions which have come about as the result of the adjustment of forces, some of them creative, some of them destructive, some of them making for order and durability and beauty and some of them tending to confusion, instability, and ugliness. . . If we succeed in bringing about a better understanding of the kind of dependence that should be created and maintained between the architect and all the agencies that may enhance the quality, significance, and beauty of his finished work, we shall be laying the foundation of an architectural expression which as the years go by shall typify more vitally the locality and time.[236]

Notwithstanding these lofty aspirations, the 1927 annual AIA convention proved to be the zenith of the historicist agenda of collaboration. La Farge's failing health and retreat from professional activities may have been partially to blame for the demise but, paradoxically, the agenda fell victim to its own success. [237] Thematic attention to collaboration at the AIA convention and subsequent pervasiveness in architectural journals so embedded the term into the architectural lexicon that it morphed from a carefully orchestrated architect/artist iteration to a less restrictive meaning. Leon Solon, for instance, wrote a favorable piece on the Fidelity Mutual Life Insurance Company building in Philadelphia, noting that the collaboration amongst architects Zantzinger, Borie & Medary -- the firm of AIA president Milton Medary -- and an assemblage of artists "might well serve as a model in future practice." [238] That this collaboration reflected participation by an engineer did not go unnoticed, as Solon subtly suggested that the building's "structural interest" was "deliberately subordinated in the desire to create decorative opportunity.[239] Gilmore D. Clarke followed with a two-part article co-authored with engineer Leslie G. Holleran that was nothing less than a blasphemous denial of La Fargian collaboration. Clarke and Holleran concluded from their own professional experience that bridge design requires "collaborative effort," a reality of practice that architects and engineers alike should acknowledge.[240] Even architect Paul Philippe Cret adopted a somewhat conciliatory tone in recounting his contentious relationship with Ralph Modjeski on the Delaware River Bridge, asserting that architects may indeed "exert some influence" on the structural form of a bridge

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[235] "Artistic Building is National Need," *The New York Times*, (26 August 1928), 160.

[236] Ibid.

[237] See, for instance, "Notes," *The Metropolitan Museum of Art Bulletin*, vol. 33, no. 2 (February 1938), 57 and the report that Leopold Arnaud replaced La Farge as speaker in the Charles T. Mathews Lecture Series on Gothic Architecture at the museum.

[238] Leon V. Solon, "The Fidelity Mutual Life Insurance Building, Part 1: Collaboration in Design," *Architectural Record*," vol. 63, no. 1 (January 1928), 3.

[239] Ibid.

[240] Gilmore D. Clarke, "Collaboration in Bridge Designing, Part 1: The Architect," *The Architectural Forum*, vol. 48, no. 5 (May 1928), 729.

when "collaborating with the engineer."[241] In a further deterioration of the historicist iteration, W A. Starrett of the highly regarded Starrett Brothers construction firm argued for a far more fungible definition, allowing for what "might properly be called the collaboration between the owner, architect, and builder."[242] In doing so, Starrett undermines the elevated significance historicists had assigned to collaboration over other forms of collective action and substitutes an expansive view that gives more credence to the patron-architect-builder "building trinity."[243]

More critically, La Farge and his compatriots were unable to overcome the limited acceptance of collaboration by architectural practitioners, the majority of whom were not card-carrying members of the AIA. While collaboration held great fascination behind the closed doors of elite clubs, it failed to resonate with practitioners far more interested in pragmatic matters of practice than "discussions on the art of architecture."[244] For all the effort invested in dissemination of the agenda through clubbing, pedagogy, public outreach, and politicking, members of the AIA Committee on the Allied Arts reluctantly reported a year after the 1927 convention that "there still persists in the minds of many people a curious misapprehension as to the significance of the word collaboration, a feeling that it is something new . . . inject[ed] into the practice of architecture."[245] Beyond issues of identity and authority, it was a "misapprehension" exemplifying the socio-economic vagaries that broadly challenge the transference of architectural theory into practice, not just those pertaining to collective action.

Most significant to this idealization/realization divide and the ebbing of the historicist iteration of collaboration was the onset of the Depression in 1929, as an idealistic transformative agenda gave way to far more quotidian concerns of economic survival. Faced with a scarcity of work, architects of all stylistic persuasions assembled ad hoc working relationships to pursue public sector commissions spawned by federal intervention in the economy. From this situation, as I shall explore in the next chapter, a new meaning of collaboration emerged, one that shed its historicist overtones in favor of alignment with the aesthetic and social program of modernism.

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[241] Paul Philippe Cret, "The Architect as Collaborator with the Engineer," *The Architectural Forum*, vol. 49, no. 1 (July 1928), 97-104; and Farnham, 258-279.

[242] W. A. Starrett, "Collaboration between Architects and Contractors," *Architectural Record*, vol. 56, no. 5 (November 1927), 298-299. While acknowledging Starrett's assistance in preparing his own article on this topic, A. Kenneth McKeand nonetheless insists on referring to architects and contractors as "co-workers" (A. Kenneth McKeand, "Architect and Contractor, Co-Workers," *The Architectural Forum*, vol. 49, no. 2 (August 1928), 248-254.

[243] Jenkins, *Architect and Patron* (1961).

[244] According to Robert D. Kohn, one of two principal protagonists in the next chapter, the pre-occupation with art and architecture evidenced by La Farge and his historicist colleagues, along with a proclivity for "prescribing the exact terms" of architectural practice, did not conform with the economic realities of the profession (Robert D. Kohn, "Does the Architect Function as He Should," *AABN*, vol. 115, no. 2253 (26 February 1919), 295).

[245] "Report of the Committee on Allied Arts," *Proceedings of the Sixty-first Annual Convention of the American Institute of Architects* (Washington, D.C.: Board of Directors of the American Institute of Architects, 1928), 10.

Chapter Three

Robert D. Kohn and William Lescaze: Cooperation, Collaboration & Competition

In the previous chapter, I discussed an iteration of collaboration intimately engaged with the arts and nurtured through clubbing as historicist-oriented architects sought to preserve their professional aspirations against the rising tide of modernism. I now turn to collaboration from a modernist perspective, within the context of Depression-era polemics over the efficacy of the free market system and collective action as a mediating force between the individual and society, or as noted New Deal economist Rexford Tugwell portrayed it, a struggle between "coordination or collectivism" and "individualism and atomism."[246] Yet in this tumultuous period, during which the disappearance of private sector commissions forced droves of architects into public service, collaboration did not reign supreme in the architectural discourse. Rather, it was in open competition with another collective action term -- cooperation -- as the ideal expression of collective action. Indeed, to exemplify this architectural discourse, the protagonists in this chapter are a pair of architects operating under the broad banner of modernism who nonetheless found little common ground on matters of collective action. One, Robert D. Kohn (1870-1953), favored cooperation amongst the professions as a model for collective action for all sectors of society, while dismissing collaboration for its historicist implications. The other, William Lescaze (1896-1969), vigorously promoted collaboration as crucial to a modernist re-integration of art and architecture, but resisted it as a technique in his own practice.[247] The juxtaposition of these two positions not only foregrounds competing modernist approaches to collective action as a transformative mechanism, it demonstrates the different strategies of collective action employed in articulating the identity and authority of the modernist architect.

Background: Robert D. Kohn

As with other chapters in this study, I examine the educational, social, and professional background of the protagonists within the broader socio-economic and architectural landscape in an effort to establish influences and connections contributing to their positions on collective action. For Robert D. Kohn, this discussion begins with his interest in the social dimension of buildings. Indeed, when speaking and writing about architecture, Kohn gave utmost primacy to architecture as enveloping "social functions . . . which makes possible their most efficient and helpful development."[248] Inspired by modernism, he acknowledged the contemporary industrial

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[246] Rexford G. Tugwell, "The Progressive Orthodoxy of Franklin D. Roosevelt," *Ethics: An International Journal of Social, Political, and Legal Philosophy*, vol. 64, no. 1 (October 1953), 2. Tugwell, a "Collectivist" disciple of Thorstein Veblen, subsequently acknowledged the political hazards of collectivism. "No politician could survive who did not praise free enterprise, proclaim his devotion to the small businessman, and denounce big businessmen and socialists alike. Their leaders had emphatically not told Americans that they were, in fact, members of a collectvity, that each lived in a close and necessary association with others, and that the good of one had become the good of all. This was the more remarkable because of the particular experiences of that generation, the most startling of all being the very depression they were now in the midst of." (Rexford G. Tugwell, "Franklin D. Roosevelt on the Verge of the Presidency," *The Antioch Review*, vol. 16, no. 1 (Spring, 1956), 69-70.

[247] Robert D. Kohn, "The Professions and the Public" *The Standard,* vol. 4, no. 7 (April 1918), 189

[248] Robert D. Kohn, "Influences and Tendencies in American Architecture," *The Standard* (October 1916), 34.

complex as a legitimate precedent for other building typologies, noting its record of progress to be "further than any other type of building in the direction in which we would desire." [249] The industrial setting, Kohn observed, with its "insistent demand for light and air and efficient environment forced the adoption of new forms of construction to meet these needs in the first place, irrespective of whether they were good looking or not." [250]

The adoption of such a modernist attitude may seem surprising at first, given Kohn's immersion in historicist thought during his formative years under William Ware at Columbia and then again at the École des Beaux Arts from 1891 to 1895. It was an immersion that contributed to a decidedly classical palette in his early commissions but, consistent with general stylistic tendencies in America, Kohn transitioned in the 1920s and 1930s to a simpler architectural vocabulary devoid of the heavier and more formulaic language of his earlier work. [251] He sought "new and expressive phrases" from recognizable traditions of the Renaissance while simultaneously finding inspiration in the modernist inclination toward honesty of materials and natural light.[252] Indeed, Kohn readily dismissed most American architecture erected since the Civil War -- "a deplorable collection of wooden mansards, pitiable attempts in wood at 18th century French architecture, the Swiss Chalet houses, the Gothic revival mostly in wood and imitation stone, and its successor, the jig-saw and Victorian "Eastlake"-- for an overemphasis on stylistic expression and unresponsiveness to functional and aesthetic exigencies.[253]

A prolific practice -- individually and collectively with colleagues Clarence Stein, Henry Wright, Frank E. Vitolo, and Charles Butler -- afforded Kohn ample opportunity for architectural experimentation on substantive commissions such as a twenty-two story office building at 18-22 East 48th Street (1927-28), a thirty-story building for the Vanderbilt estate at 501-505 Madison Avenue (1929-30); a forty-three story tower at 444 Madison Avenue (1930-31), and a limestone-clad redevelopment of the A. I. Namm Department Store (1924-25 and 1928-29) -- at the time,

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[249] Robert D. Kohn, "The Architect: His Work and His Ethical Standard, A Contribution to Vocational Guidance," *The Standard* (1917-1918), 4.

[250] Ibid.

[251] This early work included a collection of townhouses at Riverside Drive, West 106th Street, and East 74th Street, a neo-Renaissance building for the Ethical Cultural School (1902) in association with Carrère & Hastings (followed nine years later by an adjacent limestone-clad meeting hall for the Society for Ethical Culture), and the thirteen-story Hermitage Hotel (1905-1907) with four-story Doric-like columns, vertically-oriented arts & crafts mid-facade, and hybridized Gothic/Art Nouveau upper dormer section (Christopher Gray, "New Streetscapes: The Hermitage/ National Hotel; Off Times Square, A 1933 'Remuddling,'" *The New York Times* (24 March 1991); *New York City Guide: A Comprehensive Guide to the Five Boroughs of the Metropolis prepared by the Federal Writers Project of the Works Progress Administration in New York City*, New York: Random House (1939), 278-279, 357; and Frank Eugene Kidder and Thomas Nolan, *The Architects' and Builders' Handbook: Data for Architects, Structural Engineers, Contractors, and Draughtsmen* (New York: John Wiley & Sons, Inc., 1921), 1616). Kohn also designed the fourteen-story Art Nouveau-styled New York Evening Post building (1906) bearing cast-iron spandrels ornamented with images of sixteenth and seventeenth century printers. (*Landmarks Preservation Commission Report on A. I. Namm & Son Department Store*, Designation List 359, LP-2170 (15 March 2005), 4).

[252] Kohn, "Influences and Tendencies," 37.

[253] Ibid., 35-36.

one of the largest such stores in the United States (Image 7).[254] His willingness to manipulate traditional forms in these buildings places Kohn squarely amongst a "second generation" of École-trained American architects who, according to Robert A. M. Stern, sought "a means of architectural expression consonant with traditional theories of composition and design while at the same time suited to modern needs."[255] Such adaptive expression manifested itself as either a simplification of traditional forms or a new architectural lexicon grounded in Beaux-Arts theory, in the spirit of Philippe Cret (1876-1945), H. V. B. Magonigle, Raymond M. Hood, Ely Jacques Kahn, Philip L. Goodwin, and William Van Alen.[256]

While Kohn's extensive portfolio of completed work suggests an architectural practitioner pre-occupied with business and artistic considerations -- he respected Morris and Ruskin for their promotion of "honesty," "adaptability" and suitability of materials linked to function -- the principal motivating force behind his personal and professional activities, and indeed his advocacy of cooperation as the ideal form of collective action, may be located in the realm of ethics.[257] Kohn fervently believed in a common ethical basis and interdependence in all human relations, a belief that flowed from active participation in the Ethical Movement -- initiated with local ethical culture societies in New York (1876), Philadelphia (1885), and St. Louis (1886) -- that mobilized adherents such as Kohn, his colleague Stein, and the physicist J. Robert Oppenheimer for social outreach in the areas of education, housing, and worker rights.[258] Considered within the context of Progressive era social activism exemplified by Jane Addams and John Dewey, the Ethical Movement arose in response to the perceived failure of the state and religion to mitigate the debilitating societal effects of militarization, urbanization, and industrialization in a modernizing world. As its founder, former Cornell University lecturer Dr. Felix Adler, wrote, to grasp the essence of the Ethical Movement:

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[254] In addition to Kohn serving as a consultant to Wright and Stein on their early housing projects at Sunnyside Gardens (1924-1928) and Radburn, New Jersey (1928-1932), architectural production amongst the trio was considerable, including 683 Fifth Avenue (1919) by Kohn and Butler, Parkwest Hospital (1925-26) by Butler and Stein, multiple buildings for the Fieldston School (1927-1928) by Kohn and Stein; and the neo-Romanesque Temple Emanu-El on Fifth Avenue at 65th Street (1927-29) by Kohn, Butler, and Stein in association with both Goodhue Associates and Mayers, Murray and Phillip, its 11,000 square feet reported to be the largest Jewish temple in the world (Edward K. Spann, *Designing Modern America: The Regional Planning Association and its Members*, Columbus: Ohio State University Press (1996), 1, footnote 26 on page 9, and 16; *Namm Store*, 4-5; and *New York City Guide*, 357). The treatment of the cornice, it seems, was of great interest to architects in this period given the ever-increasing heights of buildings. One commentator was not pleased with Kohn's efforts in this regard, noting that even "progressive architects" such as Kohn, Louis Sullivan, and Cass Gilbert "have done little to solve the problem." "Note and Comments," *The Architectural Record*, vol. 27, no. 5 (May 1910), 431).

[255] Stern, "PSFS," 85.

[256] Ibid.

[257] Kohn, "Influences and Tendencies," 35.

[258] William Henry Lyon, *A Study of the Sects* (Boston: Unitarian Sunday-School Society, 1892), 1179; Robert D. Kohn, "A Program for the American Ethical Union," *The Standard*, vol. 6, no. 1 (October 1919), 52-57; and E. O. Watson, ed., *Yearbook of The Churches, 1921-22* (Washington, D. C.: Hayworth Publishing House, 1922), 226. Kohn also acknowledged some influence from the writings of the English Fabian Society members Sidney and Beatrice Webb, though clearly secondary to that of the Ethical Movement. The Webbs concluded from their research that the narrow specialized focus of professions -- coupled with tendencies toward the privileged classes -- precluded professionals from grasping the broader societal exigency of their services. (WQXR (New York) radio address on May 25, 1941, as condensed in Robert D. Kohn, "Functional Organization – Good and Bad," *The Standard*, vol. 28, no. 1 (October 1941), 13).

> It is indispensable to bear in mind the evils which it seeks to counteract. These evils are chiefly materialism and moral skepticism, a skepticism which, nourished by the crumbling of ancient creeds, has attacked the very springs of moral endeavor, has produced in the minds of many, a feeling as if there were nothing great any more worth living for, and as if life had been utterly emptied of all its nobler content.[259]

Of relevance to this study is that in mobilizing against such "evils," the Movement proffered a program of "cooperation" in human relations premised on the "supremacy of the moral ends above all other human ends and interests."[260] Equally important is that the Movement was a continuous vein in Kohn's life. He attended Ethical Society meetings as a youth, served as president of both the New York Society for Ethical Culture and of its umbrella organization, the American Ethical Union, and was a frequent contributor to its journal, *The Standard*.[261] Kohn made no attempt to mask the influence of the Movement on his professional activities. Indeed, he openly credited the "neo-Kantian" Adler with setting him on "the right course," one characterized by "cooperation" and a common ethical basis across all scales -- family, work, community, state -- of "interlocking and inseparable" human relations.[262]

This tenet of inseparability, Kohn argued, applied equally to the professions in their primary obligation of service to society, necessitating that each profession seek through "cooperation" with other professions the "right relations" such that "no group is to advance its own interests without consideration for the interests of all the other groups, that each needs the

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[259] Felix Adler, *Ethical Record*, vol.1, 2, as cited in Leo Jacobs, *Three Types of Practical Ethical Movements of the Past Half Century* (New York: The MacMillan Company, 1922), 107. Adler noted several needs prompting formation of the Ethical Movement as an alternative to established religions: "In the first place, there is the need of founding religion upon a basis of intellectual truth. The second reason why an independent movement for ethical culture is necessary is, that we need to give men a clearer understanding of applied ethics, a better insight into the specific duties of life, a finer and more comprehensive scheme of moral practice. . . A third reason why ethical movement and ethical societies are needed, is that they are needed to supply that stimulus and energy to the will which is so indispensable. . . Fourthly, ethical societies are needed for the sake of the children. It is time that men of advanced opinions should have the courage to teach their children what they themselves believe to be true. And lastly the purpose of an ethical movement is that out of it may spring an ethical belief with regard to the world, a moral optimism, a belief that the universe is making for righteousness, that there is a good tendency in things" (Felix Adler, "Twenty Years of the Ethical Movement," as cited in Jacobs, 111).

[260] Henry King Carroll, *The Religious Forces of the United States* (New York: Scribner, 1912), 384. Jacobs notes that "coöperation was not emphasized" in organized religion, whereas in the "new ideal" of the Ethical Movement "mankind is the social whole and the social whole includes mankind of to-morrow as well. This social whole, coöperating harmoniously together is the very ideal of the future. There is no other. The social whole is prompted to greater exertion because the ideal is identified with the large social whole which embraces posterity in its scope" (Jacobs, 145). Jacobs further notes that the "ethical Culture Movement starts with the notion that there is a natural line of demarcation not alone between between groups but between individuals. It draws that line distinctly. It isolates each from the rest by a bar and says: Coöperate despite these bars. The bars of separation are numerous; there are infinite differences just because there are infinite spiritual beings. Now enjoins the Ethical Movement: Work together because and for the sake of these very differences" (157).

[261] Watson, 226; and "Kohn Heads Ethical Union," *The New York Times* (23 May 1939), 22.

[262] Kohn, WQXR (New York) radio address, 12. Howard Radest explains, "[t]wo "Kantian concepts played a major role in Adler's development: (1) that he existence or nonexistence of a deity could not be demonstrated by 'pure reason' since contradictory conclusions could be drawn from the same data; and (2) that morality, 'practical reason,' could be established without reliance on theology. The autonomy and centrality of ethics became the guiding philosophic themes for Adler. His development of these in their application to the philosophic and practical problems of industrial society was to become his life work" (Howard Radest, "Prologue -- Felix Adler: A Biographical Sketch," in Robert S. Guttchen, *Felix Adler*, New York: Twayne Publishers, Inc. (1974), 23).

corrective of the other's development, and that each is to contribute its own distinctive kind of service to the good of all, so that this, in the end, may lead to a real democracy, founded on the most potent interests of its citizens."[263] Such "real democracy" of common effort toward the common good was achievable, from the Ethical Movement paradigm, only through an orchestrated "reconstruction of industrial society" offering every individual a vocation suited to their capabilities. Robert S. Guttchen explains that Adler viewed vocation as "the commitment of the person to meaningful work. . . Properly understood, a vocation was not merely a job or even a career. Rather, it had historic components, involved the vocationalist in interdependent relationships with all other vocationalists, and served as a lever for social reform, vocation was the practical moral center for a truly radical attack on industrial society."[264]

This ethical prerequisite of "right relations" through cooperation for the vocations, Kohn observed, is "immensely helpful to the architect who takes his place seriously in the world's work. For if he would really be a good architect he must realize in his work the possibilities for good that are implicit in the human interests with which he has to deal and for which he must find the best environment." Beyond acknowledging the primacy of human interest, an architect from Kohn's perspective "must want to make things better than they are now. He must have real human understanding and human sympathy. He should be immensely interested in what is going on about him and should indicate that he wants to know how things are made and why they are made in some particular way. He must show a wide interest in the needs and desires of those who live in a different social strata. He must," Kohn put quite simply, "be able to get along with people."[265]

Ethics, Identity, and the Professions

This discussion of ethics is valuable here not only because it establishes a foundation for Kohn's views on cooperation as the ideal collective action, it is consistent with a flurry of attention amongst professions in the early twentieth century to weave ethical codes into normative practices.[266] Aside from pragmatic issues such as fees -- which raised delicate

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[263] Kohn, "The Professions and the Public," 188-189. "Adler saw in his concept of vocationalism the possibility of a reconstruction of the democratic ideal as well. Through vocation, the participation of everyone in society would be insured. Each person, through the development of his talents and through his interaction with others, would find a place, a meaningful place, in society. Thus the pressures of alienation would be met and the deadly superficiality of the commercial spirit could be successfully challenged. The suicidal pathways of war, revolution, and anarchy could be avoided." (Guttchen, 36).

[264] Guttchen notes that Adler "developed three coordinate themes: a concept of labor as a social and political but, significantly, also an ethical movement; a concept of vocation; and a concept of industrial politics. Adler's proposal, in brief, was that the reconstruction of industrial society was both possible and necessary. The clue to reconstruction was the development of vocational opportunity for every member of society based upon the 'talents' that were to be attributed to each person. Vocation, the commitment of the person to meaningful work, was the core (Guttchen, 36).

[265] Kohn, "The Architect: His Work and His Ethical Standard," 6-7.

[266] Beth Linker, "The Business of Ethics: Gender, Medicine, and the Professional Codification of the American Physiotherapy Association, 1918-1935," *Journal of the History of Medicine and Allied Sciences*, vol. 60, no. 3 (2005), 323. Linker notes that there is scant scholarship on what she refers to as an "ethics boom" in the period immediately following the First World War. She further observes that codes of ethics are more than just "tools of moral guidance, based on unchanging virtues of honesty, sacrifice, and selflessness." When viewed from a historical perspective, she argues, "codes of ethics are dynamic documents that provide a unique window into the workings of interprofessional conflicts and negotiations. For the historian, codes of ethics are, above all, statements of distinct fears, concerns, and desires of a professional group of people in a specific time and place, in effect, an insight into a profession."

questions about the distinctions between a professional and businessman -- and loftier ambitions such as the avoidance of competition amongst lawyers, these new codes sought to emulate the "protector/dependent" client model established by the American Medical Association in the previous century, with a presumed asymmetry of knowledge in favor of the professional.[267] Of particular import to Kohn was that the AIA's own nascent Code of Ethics offered a set of relations amongst architect, client, and contractor that, in principle, is neither negated nor swayed by compensation the architect receives. The architect, he argued, "must be unbiased and must decide fairly" and is charged with serving as "as interpreter of the contract between the man who pays him and the man whose work he supervises. . . In his code of ethics the architect is enjoined to remember his responsibilities towards his associates; he is to recognize and encourage the services his associates render in the course of his work."[268]

Such a balanced view, at least in theory, assured the architect's commitment to the client while, from Kohn's perspective, empowering him to privilege greater societal good over the interests of the client, or for that matter, any individual or group. This ethical basis was not, in Kohn's analysis, restricted to architectural practice but stood metaphorically for all human relations.

> We are to help others in every walk of life to realize their own best possibilities, to make evident their own most worth-while contribution, and that is exactly what the architect must strive to do in the process of working out the brick and mortar clothing for every form of human activity.[269]

The ability to recognize and encourage the best in associates was far easier, in Kohn's mind, in previous generations when the architect possessed all of the technical expertise necessary for building design.[270] With the rise of specializations in response to increasingly complex building typologies and technologies, two issues arose. First, the architect's position changed to that of a "director or guiding spirit of a group of co-operators" -- former peers now separated by carefully delineated bodies of disciplinary knowledge, language, and practice -- thereby making "right relations" difficult to maintain.[271] Secondly, Kohn observed that by "narrowing to the individual man himself," specializations insulated individuals from society in "unrelated class categories of self-interest" that precludes "conscious interrelation and cooperation" amongst individuals, professions, and society.[272] To remedy this, he proposed 'vertical' unions in which "all those engaged in a particular process, whatever their craft, are

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[267] Samuel Haber, *The Quest for Authority and Honor in the American Professions, 1750-1900* (Chicago and London: The University of Chicago Press, 1991), 237 and 350.

[268] Kohn, "The Architect: His Work and His Ethical Standard," 4. This view, which seems contrary to Kohn's otherwise egalitarian view of cooperation, places the architect on a higher professional and ethical plane than other building professionals, with the capacity to serve as arbiter between owner and contractor and sole possessor of building knowledge, while falling short of being a guarantor.

[269] Ibid, 5.

[270] Ibid., 5-6.

[271] Ibid.

[272] Kohn, WQXR (New York) radio address, 14.

related together in one organization, and have a common understanding of the essential part each contributes to the whole result." [273]

This emphasis on formulating structures -- rather than processes or methodologies -- to foster suitable conditions for cooperation and the "right relations" amongst professionals prompted Kohn, along with architect Frederick L. Ackerman and AIA Journal editor Charles Whitaker, to form in 1919 a thirty-six member Post-War Committee on Architectural Practice.[274] Amidst wartime restrictions on raw materials that, in combination with inflationary pressures stalled private sector construction activity, the Post-War Committee initiated a bipartite "program of inquiry" to assess if the profession was indeed serving the greater good of society and to propose methods for enhancing the "efficiency and adequacy" of architectural practice.[275] As committee members reported to the AIA at its 1920 annual convention, their objectives were to

> encourage a more comprehensive organization of the entire Profession and clear the atmosphere of uncertainty and misunderstanding as to what the term 'Architect' implies and what responsibilities attach to the practice of the professions; to recognize that the problems of the Profession are largely social problems affected sympathetically by rapidly changing social and economic conditions; to impress upon architects their obligations, as professional men to society, and to bring about a clearer understanding of the relationships that should or do exist between the architect and those whom he may serve; those with whom he collaborates and all others who render a professional service.[276]

Kohn envisioned the inquiry into professional practice framed by the teachings of the Ethical Movement. Indeed, the Preliminary Outline of Programme published by the Post-War Committee reveals these teachings through Kohn's hand, prompting architects to consider if they are in the "right relations" with clients, the public, and "those with whom we would cooperate in the production of building . . . fellow architects, the students of architecture, and as professional men, with all those who render professional service."[277] In a bold challenge to the AIA, the Post-War Committee extended its reach to all practicing architects even if they had no affiliation with the association, a key maneuver given accusations against AIA elders of elitist attitudes on prerequisites for membership and advancement. "The keynote of any such investigation," Kohn explained, "must be the words 'right relationship.' As architects we should inquire whether or not we are in right relationship with the public -- with those whom we would serve. Secondly, are we in right relationship with those with whom we would co-operate, with the other professions, the engineers, the craftsmen, the industries connected with building and the trade

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[273] Ibid., 13. Kohn was cognizant of the apparent similarity between "vertical" unions and the Corporatist State in Italy. He was quick to highlight that in the Italian iteration "all democratic features of their procedures are cancelled out by the control of their delegates and the appointment of their administrative officials by the political dictatorship of the Fascist party" (16).

[274] Spann, 8.

[275] Kohn, "A Program for the American Ethical Union," 52; and Kohn, "Architect Function," 291.

[276] "Report of the Post-War Committee on Architectural Practice, *Proceedings of the Fifty-Third Annual Convention of the American Institute of Architects* (Washington, D.C.: American Institute of Architects, 1920), 20.

[277] "Post-War Committee – Preliminary Outline of Programme," *AIA Journal*, vol. 7, no. 1 (January 1919), 25; and "Appendix 2: The Post-War Committee on Architectural Practice," *Proceedings of the Fifty-Second Annual Convention of the American Institute of Architects* (Washington, D.C.: American Institute of Architects, 1919), 152-156.

organizations."[278] Kohn extended this tenet one step further, calling for "right relations" between professions and the government, both of which are ostensibly empowered to act on behalf of society. A truly democratic society of "vocational representation" can only emerge, Kohn suggested, when the "right relations" exist "between the interests of the public and the vocational interest of the citizen through the vocational organizations."[279]

In a significant step beyond their original charter, Kohn and fellow members of the Post-War Committee orchestrated a two-day inter-professional conference in Detroit in November 1919 in an effort, from Kohn's perspective, to extend a program of cooperation from his core competency -- architecture -- to envelop all professions. On his initiative as chairman, and that of Ackerman, Whitaker, Milton Medary, and Thomas Kimball, and almost simultaneously with similar efforts in England and France, over one hundred delegates representing twelve different professions gathered to address a diverse agenda on professional activities, performance criteria, educational standards, and to "find the means for co-operation" amongst the professions.[280] Kimball, serving at the time as president of the AIA, asserted in his keynote address that the underlying objective of the inter-professional conference was to eradicate the prevalence of self-interest amongst the professions, "to devise ways and means of better utilizing the professional heritage of knowledge and skill for the benefit of society, and to create relations between the professions leading to this end."[281] Toward this end, a product of the conference was a short-lived inter-professional body formulated to investigate the methods that might be "effected through cooperation locally" the objectives laid out in Detroit, administered by a twenty-one member council heavily represented by architects -- Whitaker, Ackerman, Kohn, Kimball, and Medary -- along with Felix Alder of the Ethical Society and others representing diverse professions.[282] The inter-professional council made little headway after the Detroit conference, however, and other than a scattering of announcements at the subsequent AIA annual convention

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[278] Kohn, "Architect Function," 291-292. In a letter to the editors of *AABN*, Kohn wrote: "Our recent experience has clearly confirmed…that the structural engineer should be a part of the organization of the architect's office, working together with other designers and side by side. He should not be an individual that is called in to put the structural "guts" into a building on which the design has been completed. As for the editorial comment on the need of special training for architectural engineers, I am inclined to think that what is needed is a larger development of the fundamentals of both engineering and architectural education. I think the engineers will have to be taught more about architecture and the architects will have to be taught more about construction." (Robert D. Kohn, "Letter," *AABN*, vol. 117, no. 2307 (10 March 1920), 312).

[279] Kohn, "The Professions and the Public," 189.

[280] Robert D. Kohn, "Inter-Professional Movements Abroad," *AIA Journal* (January 1920), 197; "May Sixth - Evening Session," *AIA Proceedings* (1920), 71; and Robert D. Kohn, "Notes on the Inter-Professional Conference," *The Architectural Forum*, vol. 32, no. 1 (January 1920), 1. As Kohn recounted, "The American Inter-professional Conference organization was accomplished at Detroit, November 29, 1919. In England a preliminary Conference was held on 22 November 22, 1919 and on February 7, 1920, the 'National Federation of Professional, Technical, Administrative, and Supervisory Workers' was duly formed at a meeting in London. In France the "Societe des Auteurs et Compositeurs dramatiques" addressed to the Architects in November last an invitation to join in the creation of a "Union Generale des Professions Intellectuales ou Liberales," which invitation was accepted on December 11, 1919" (Kohn, "Inter-Professional Movements Abroad," 197).

[281] Kohn, "Notes on the Inter-Professional Conference," 1.

[282] "May Sixth - Evening Session," *AIA Proceedings* (1920), 71; "The Inter-Professional Conference," *AABN* (December 3, 1919), 691; and Kohn, "Notes on the Inter-Professional Conference," 1. The initial General Council included C. T Chenery, Basil M. Manly, and Charles H. Whitaker of Washington D.C, and Frederick Ackerman, Felix Adler, Robert Kohn, E. J. Mehren, Lena M Phillips and Calvin W Rice of New York City; Dr. W. G. Ebersole of Cleveland, Dr. Gillette Hayden of Columbus Ohio, Thomas R. Kimball of Omaha, Paula Laddey of Newark, Milton Medary, Jr of Philadelphia, and W. W. Bishop and Dora M Barnes of Ann Arbor. Michigan.

soon evaporated as each professional association turned inward to issues of more immediate concern to its membership.[283]

A second outcome of Kohn's activities with the Post-War Committee was formation of a National Congress of the Building and Construction Industry -- modeled on similar initiatives by the Federation of Construction Industries -- charged with formalizing and sustaining "cooperation between Organized Labor, Building Contractors and Engineers" as the first step to a "broader cooperation and more sympathetic understanding between these great elements in the Building Industry."[284] As Kohn elaborated, the principal objective of the Congress, which spawned regional groups in Boston, Philadelphia, and New York, was broadly

> to get the architects, the contractors, the engineers, the sub-contractors, the dealers and producers in building materials and laborers to realize that each of these groups is after all only one functioning element of the industry; that the architect cannot improve his status unless the laboring man improves his, and that each element is at the mercy of all the others; that each element has got to bring all the others along with it if we are to get anywhere at all in approaching what should be the aim of the industry.[285]

From one perspective, the Congress may be seen as a manifestation of Adler's teachings on cooperation in the wake of the failed inter-professional council. From another perspective, it was a direct response to the increasing atomization of professions within the industry after the First World War, a situation characterized by labor disputes, inconsistent contractual arrangements, unclear jurisdictional boundaries, and fierce competition for scant private sector development opportunities. The Congress, in Kohn's mind, would serve as a mechanism for mediating jurisdictional responsibilities, resolving cost and labor issues, and finding common ground on technical language and methodologies. Critical to its success, Kohn insisted, was that architects move beyond their hesitancy to participate in such cooperative arrangements, a condition he surmised stemmed from a generation or more of efforts to articulate an architectural profession distinct from, and more importantly, elevated above an assortment of builders, craftsmen, and designers engaged in the business of building. That some architects of a La Fargian vein might view such unbounded collective action as anathema to professional identity was not lost on Kohn. "Surely the profession has got beyond that," he insisted. Continuing, he argued:

> Its knowledge, its training, its recognized service, are such that we dare go hand in hand with the other elements; and the other elements want us to do so. . . It is that by-product of cooperation in the human and most worthwhile relationship established which is the first step in a new kind of democracy. I am convinced it is the first step towards a new spirit that we absolutely need in this country.[286]

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[283] "Conference of the Interprofessional Relation," *AABN*, vol. 117, no. 2319 (June 2, 1920), 674.

[284] "A Congress of the Building Industry," *AIA Journal*, vol. 8, no. 9 (September 1920), 340; and "What Did the Post-War Committee Accomplish?" *AIA Journal*, vol. 8, no. 7 (July 1920), 268.

[285] Robert D. Kohn, "Report on the Congress of the Building and Construction Industry," *Proceedings of the Fifty-Fourth Annual Convention of the American Institute of Architects* (Washington, D.C.: American Institute of Architects (1921), 66.

[286] *AIA Proceedings* (1921), 66-67.

Most emblematic of this "new spirit" and Kohn's unrelenting pursuit of cooperation amongst the professions were his concurrent presidencies of the AIA and of the New York Building Congress, earned through extensive experience and active engagement with professional and societal causes. Kohn commenced a two-year term at the helm of the AIA in 1930, thanks in great measure to a promotional campaign orchestrated by Ackerman, George Young, Jr., dean of architecture at Cornell University, and Cornell graduate Richmond Shreve who, with his partners Lamb and Harmon, designed the Empire State Building.[287] Kohn's principal competitor for the position, J. Monroe Hewlett -- in 1928 he succeeded La Farge as chair of the AIA Committee on the Allied Arts and as AIA first-vice president in 1929 was by tradition slated to be the next president -- would have made a "charming and presentable President," according to Young, but represented an anachronistic "Beaux-Arts atmosphere" at odds with "business men and people who are trying to look at the real problems" of professional practice.[288] By contrast, Ackerman argued, Kohn was active in the development of building codes, engaged in inclusive dialogue with related building trades and crafts, and most notably, foregrounded ethics in the discourse on professional practice and role of the architect in society.[289] That Kohn was "responsible for the Building Congress idea" and was currently president of the New York affiliate of the Congress further solidified in Ackerman's mind and that of his colleagues the suitability of Kohn for the AIA presidency at a time when establishing

[287] George Young, Jr. correspondence to George B. Cummings dated 24 December 1929, 15/1/512, Box 8; George Young, Jr. correspondence to Frank Eurich, Jr. dated 4 February 1930, 15/1/512, Box 8; George Young, Jr. correspondence to Henry K. Holsman dated 5 February 1930, 15/1/512, Box 8; and R. H. Shreve correspondence to Dean George Young dated 17 February 1930, 15/1/512, Box 8; and "Richmond Harold Shreve," biographical summary dated November 1945, 45, 15/1/512, Box 11, Cornell Archives. Harold Shreve sought to maintain a strong connection with Cornell over the course of his career, including hiring many graduates of the architecture program and participating in campus development projects (R. H. Shreve correspondence to Egerton Swartwout dated 11 May 1931, 15/1/512, Box 9; and R. H. Shreve correspondence to Dean George Young, Jr. dated 22 May 1933, 15/1/2, Box 10, Cornell Archives).

[288] Young, Jr. correspondence to Eurich, Jr, Cornell Archives.

[289] Frederick L. Ackerman correspondence to Dean George Young dated 6 January 1930, 15/1/512, Box 8, Cornell Archives.

or renewing links amongst the building professions was most critical to offset the economic challenges of the Depression.[290]

From a symbolic perspective, Kohn saw in these dual roles the opportunity to evidence how architects might improve "coöperation with the other elements of the industry" by acknowledging and comprehending the "interrelation" of the myriad aesthetic, functional, structural, and technical considerations in architectural production.[291] A "new kind of democracy" amongst the building professions would emerge from such a spirit of cooperation, Kohn insisted, one that might serve as an ethics-based prototype for other professions and society at large.[292] From a more pragmatic perspective, the AIA and Building Congress were influential platforms from which Kohn might effect changes enhancing the social and economic prognosis for architectural production. Along these lines, as Edward K. Spann discusses, Kohn called for cooperative strategies between architects and builders on vast housing programs of "such a scale as would make it possible to offer the individual purchaser a completed house in a neighborhood that is settled."[293] Kohn was keenly aware that the realization of such a proposition, ostensibly funded through federal intervention, would represent significant

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[290] For much of his career, Kohn was an active participant in a wide range of professional and civic associations. This was not only consistent with Adler's Ethical Movement attention to social activism, it also nurtured relationships with notable practitioners who proved to be instrumental in his career. In 1901, he served on the Education Committee of the Society of Beaux Arts Architects with Ernest Flagg of New York and John Galen Howard of Berkeley, then president of the Society. (Florence Levy, ed., *American Art Annual, 1900-1901*, vol. III (Boston: Noyes, Platt & Company, 1900), 163). In 1915, he joined Architectural League officers Cass Gilbert, Bertram Goodhue, William Kendall, F. Livingston Pell, and Charles Platt on a jury to award an AIA medal of honor to Edward York and Philip Sawyer for their work on the Guaranty Trust Building (*Annual Report of the Officers and Committees of the Architectural League of New York, 1914-1915* (New York: The Architectural League, 1915), 49). Kohn worked with Clarence Stein, Frederick L. Ackerman, and Alexander Bing on the City Planning Committee of the City Club of New York, participated in the drafting of building ordinances addressing "various methods of construction," and was a member of a Committee of City Departments, which he described as a "forceful committee in which architects, engineers, underwriters, and builders work together in a fine civic spirit" (Spann, 13 and 35; and "Approve New Building Code," *The New York Times* (10 May 1912). Kohn represented the New York City chapter of the AIA chapter at a 1912 conference to review legislation put forth by the New York State Factory Investigating Commission, and in 1913 succeeded C. Grant La Farge as chapter president (*Second Report of the New York State Factory Investigating Commission* (Albany: New York State, 1913), 1320; and *Yearbook: New York Chapter of the American Institute of Architects* (New York: New York Chapter of the American Institute of Architects, 1921), 10-12). He held positions as vice-president of the New York State Architects Association (1915), chairman of the AIA Fire Prevention Committee (1917), chairman of an AIA Committee on Legislation (1918-19), and, as president of the National Fire Protective Association (1914-1915), encouraged the "cooperation" of interested professional sectors in working toward improved life safety standards. ("Current News and Comment," *AABN*, vol. 107, no. 2046 (10 March 1915): III); and "Urges Building Safety," *The New York Times* (January 16, 1916; *American Art Directory*, American Federation of Arts, (1918), 47; *Yearbook of New York Chapter of AIA*, (1921), 10-12; Robert D. Kohn, "Building Laws," in Andrew C. McLaughlin and Albert Bushnell Hart, eds., *Cyclopedia of American Government* (New York and London: D. Appleton and Company, 1914), 186; "Fire Protection," *The New York Times* (9 May 1915); "Urges Building Safety," *The New York Times* (16 January 1916); and "Fire Protection," *The New York Times* (9 May 1915), C5.) After the First World War, Kohn gathered again with Stein and Bing on a jury reviewing competition entries for tenement reconstruction sponsored by a New York State housing commission. ("Architectural Competition for the Remodeling of a New York City Tenement Block," *AIA Journal* (January 1920), 198).

[291] Robert D. Kohn, "Ethics and the Architect," *The Standard*, vol. XVIII, no. 1 (July 1931), 44-45.

[292] Ibid.

[293] Spann, 144-145.

opportunities for his architect and builder constituents in the period after 1929 when private sector development had dwindled.[294]

Background: William Lescaze

In contrast with Kohn's early experiences and those of La Farge in the previous chapter, the upbringing of Swiss-born William Lescaze bears few clues to his choice of architecture as a profession. His family was not engaged with the visual arts – his father taught German language and literature – and, in a *New Yorker* profile cited by Lorraine Welling Lanmon, Lescaze could recall no principal impetus to his interest in architecture. He did, apparently, evidence a youthful love for painting -- Lanmon depicts his earliest work as "competent" -- suggestive less of a budding artistic career than of an early interest in architectural form as an object of study.[295] Whatever may have prompted this interest, Lescaze found himself drawn to the work of Karl C. Moser, choosing to study architecture with him at the highly regarded *Eidgenössische Technische Hochschule* (ETH) in Zurich from 1915 to 1919 in a period overlapping the First World War.[296] After the war, other than brief stints with the Committee for the Reconstruction of Devastated France and in the studio of modernist architect Henri Sauvage, a dearth of opportunity in Europe prompted Lescaze to seek employment in the United States. He initially secured work in the offices of prominent Cleveland architects Hubbell and Benes, but the fortuitous offer of a residential commission in 1923 sparked the opening of his own practice in New York City. Through the end of that decade, his commissions were principally interiors -- apartments, retail showrooms, a penthouse design for R. H. Macy's 1928 exposition on industrial art, and a collection of restaurants and night clubs.[297]

Lescaze emerged rather suddenly into the architectural limelight with announcement in 1929 of a partnership with the modernist convert George Howe (1886-1955), his elder by a decade. This was an intriguing alignment for the aspiring modernist Lescaze for, as Robert A. M. Stern notes, Howe grasped the underlying theory of the École far better than any other American architect, having studied under Charles H. Moore at Harvard and then with Victor

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[294] Ibid. This was a period, as Plunz has described, of "extreme hardship" for the architectural profession, prompting action toward formation of architect welfare societies in a number of American cities. (Richard Plunz, *A History of Housing in New York City* (New York: Columbia University Press, 1990), 248).

[295] Lorraine Welling Lanmon, *William Lescaze, Architect* (Philadelphia: The Art Alliance Press; London and Toronto: Associated University Press, 1987), 15. This background paragraph relies principally on Chapter One of Lanmon, *William Lescaze, Architect*, 15-28.

[296] William Lescaze, *On Being an Architect*, New York: G. P. Putnam's Sons (1942), 81.

[297] Lescaze recalled being "delighted to collaborate" during this period on a Chinese restaurant with architect Hugh Tallant. (Lescaze, *On Being*, 242). A notable exception to his early interiors portfolio was the Capital Bus Terminal completed in 1927, cited by Marges Bacon as a seminal American expression of European modernism, while David Leatherbarrow and Mohsen Mostafavi proffer it as precedent for the "curved and cantilevered corners" of the later PSFS Building by Lescaze in partnership with George Howe. (Mardges Bacon, *Le Corbusier in America: Travel in the Land of the Timid* (Cambridge: MIT Press, 2001), footnote 33, 359; and David Leatherbarrow and Mohsen Mostafavi (*Surface Architecture*, Cambridge: MIT Press, 2002), 142). Philip Johnson and Henry-Russell Hitchcock saw fit to include the terminal in their canonical 1932 International Exhibition at the Museum of Modern Art, while Robert A. M. Stern dismissed it in 1962 as a "minor work" of structural "ambivalence" suffering from a "crudity of detailing" attributable to Lescaze's relative inexperience at the time. (Robert A. M. Stern, "PSFS: Beaux-Arts Theory and Rational Expression, *JSAH*, vol. 21, no. 2 (May 1962), 91).

Laloux at the École from 1908 to 1913.[298] Howe lost faith in the historicist paradigm in the late 1920s, seeking refuge in what he termed "non-traditionalism," the final step of his "conversion" occurring, as he recounted, in "collaboration" with Lescaze on the Philadelphia Saving Fund Society (PSFS) building (Image 8), the first and most notable product of their partnership.[299]

Aside from its purported role in introducing European modernism to American shores, the PSFS building has prompted vigorous scholarly debate on questions of its authorship and the extent of "collaborative" effort between Howe and Lescaze.[300] While on these points of authorship and collaboration the building may be intriguingly seen as "the product of two distinct sensibilities," contentious relations between Howe and Lescaze left a trail of conflicting archival material offering little but fodder for speculation. [301] Of greater interest here is the controversy surrounding their very public resignation in 1932 from the Architectural League of New York -- the consummate historicist showplace discussed in the previous chapter -- after rejection of their exhibition submissions. This was for Lescaze and Howe a surprising turn of events, for the League had displayed their PSFS design the prior year and some of their current work, including a model of the proposed Chrystie-Forsyth housing project in New York, was at that moment exhibited in Johnson and Hitchcock's International Exhibition at MOMA.[302] Although League president Julian Clarence Levi insisted that available exhibition space, not artistic principles, determined participation in the annual exhibition -- "founded on the basis of comprehensive collaboration of all interested in architectural design and execution" -- Howe and Lescaze nonetheless insisted that rejection of their submissions for a New York skyscraper and residences in Philadelphia and England was due to the "modern character of their designs." [303] In their reluctance to conform to what they interpreted as a narrow and anachronistic stylistic mandate by the League, Lescaze declared that he and Howe stood "for clarification of architectural principle. We are perfectly willing to fight alone rather than make compromises to be with the crowd. . . An

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[298] Stern, 84. Indeed, Howe's former Philadelphia practice, Mellor, Meigs & Howe, generated a considerable portfolio of historicist mansions and townhomes for the wealthy drawn from seemingly unlimited romantic sources, as exemplified by the Norman-styled, farmhouse-inspired re-construction of the Newbold residence in Laverock, PA (1921-1928), complete with drooping roofline and agricultural artifacts scattered about the "gentleman's farm" (Leland Roth, *American Architecture: A History* (Boulder, CO: Icon Editions/Westview Press, 2001), 351; and Robert A. M. Stern, *George Howe: Toward a Modern American Architecture*, New Haven, Yale University Press (1975), 31). See also *A Monograph of the Work of Mellor, Meigs & Howe*, with preface by Owen Wister (New York: Architectural Book Publishing Company, 2000 [1923]).

[299] George Howe, "Some Experiences and Observations of an Elderly Architect," *Perspecta*, vol. 2 (1953), 4.

[300] For in-depth discussions of the PSFS building, see Stern, "PSFS" (May 1962), 84-102; William H. Jordy, "PSFS: Its Development and Its Significance in Modern Architecture," *JSAH*, vol. 21, no. 2 (May 1962), 47-83; and Lanmon, (1987).

[301] Stern, "PSFS," note 39, 92. The partnership ended in 1934, after which Lescaze worked under his own name until 1965 and then as William Lescaze & Associates from 1965 onward. (William Lescaze correspondence to Elliot Willensky dated 6 January 1967, William Lescaze Papers, Box 56, Special Collections Research Center, Syracuse University Library).

[302] The Museum of Modern Art catalogue included praise for Howe and Lescaze setting a "direction in which our better architecture may be expected to advance." ("Architects' Show Bars Two Moderns," *The New York Times* (28 February 1932), 1). In 1930, Lescaze and Howe developed a range of unrealized design concepts for a new MOMA building, including a tower of stacked cubes intended to maximize natural light in the display galleries. Other Lescaze projects in the exhibition were the Capital Bus Terminal, the nursery at Oak Lane Country Day School, and a construction progress photograph of the PSFS building.

[303] "Denies League Curbed Architects Who Quit," *The New York Times* (March 1, 1932), 42; and "Architects' Show Bars Two Moderns," *The New York Times* (28 February 1932), 1.

architect must be able to practice his profession according to his individual convictions rather than the convictions of the group."[304]

Although this individualistic assertion contrasts sharply with the collaborative principles espoused by the League, Lescaze commenced soon thereafter a very public advocacy of collaboration. An early indication of his position on this topic may be seen in an exchange of correspondence published in *The New York Times* in 1938 with Mabel Dodge Luhan. As *grande dame* of the Taos art colony -- a group characterized by its pursuit of a distinctly American artistic expression amidst the "quintessential frontier experience" of the Southwest -- Luhan "figured in the developing mythos of American character and culture in the twentieth century."[305] Having "recreated herself as a one-woman metaphor for the decline, fall, and potential regeneration of American civilization," she readily dismissed "traditional architects" as incapable of "social, art-conscious, and cooperative" thought, seeing instead in the modernist architect Lescaze hope for a renewal of artistic and architectural communality.[306] This communality, she argued, faded over the centuries as artists and architects alike became "more individualized and less cooperative, more grandiose and self-satisfied with the 'picture' . . . and have lost the group consciousness that they shared in the past in guilds, and in great undertakings like the cathedrals and palaces and public institutions of the best art periods."[307] In his published response to Luhan, Lescaze acknowledged

> what a few of us modern architects have contended for years -- namely, that art does not result from accident or whim; that art indeed must always be preceded by plan, by organization. This is all the more necessary when the aim is not only perfection of one form of art alone, but perfection of three of them: architecture, painting, sculpture, brought together in perfect balance and harmony.[308]

With the selection of painter and sculptor, Lescaze argued, the "orchestra" of disciplines is ready to labor harmoniously toward the architect's creative vision.[309] Interestingly, neither

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[304] "Architects' Show," 1. Some of Lescaze's completed work was once again exhibited by the Architectural League in February 1940, including the CBS headquarters in Hollywood (1938), the Aviation Building and Swiss Pavilion at the 1939 World's Fair, and PSFS Building ("Photographs Exhibited at Architectural League, February 1940," unpublished summary in William Lescaze Papers, Box 56, Special Collections Research Center, Syracuse University Library). In 1958, the president of the Architectural League urged Lescaze to re-join the organization (Morris Ketchum correspondence to William Lescaze dated 14 October 1958, William Lescaze Papers, Box 56, Special Collections Research Center, Syracuse University Library).

[305] Artists first arrived in the Taos region at the start of the twentieth-century, drawn by its rustic natural beauty. For those seeking to nurture an American aesthetic, Taos held great promise for a "quintessential frontier experience - vast desert-mountain spaces, wild but noble savages, and unlimited personal freedom" (Sylvia Rodriguez, "Art, Tourism, and Race Relations in Taos: Toward a Sociology of the Art Colony," *Journal of Anthropological Research*, vol. 45, no. 1 (Spring 1989), 80). Luhan moved to Taos in 1916, and promptly set up a salon that attracted an eclectic mix of artists and writers. Over time, a substantive artist colony arose, characterized by a shared romanticization of the western frontier and Native American culture (Lois P. Rudnick, "Radical Visions of Art and Self in the 20th Century: Mabel Dodge and Gertrude Stein," *Modern Language Studies*, vol. 12, no. 4 (Autumn 1982), 51-63).

[306] Rudnick, 51; and typescript of Mabel Dodge Luhan, "Open letter by Mabel Dodge Luhan to William Lescaze -- published in *The New York Times*, May 22, 1938," first page, William Lescaze Papers, Box 58, Syracuse Archives.

[307] Luhan, "Open Letter," first page.

[308] William Lescaze, "Open Letter to Mabel Dodge Luhan -- published in *The New York Times*, Sunday, June 12, 1938," 1, William Lescaze Papers, Box 58, Syracuse Archives.

[309] Ibid.

Luhan nor Lescaze up to this point in their exchange of correspondence used the word collaboration. It was an article on the inaugural voyage of the Dutch liner *Nieuw Amsterdam* published near Luhan's letter that prompted Lescaze's first published reference to collaboration. Design responsibility for the ship's public spaces, journalist George F. Horne reported in the article, fell to over sixty "leading" architects and artists on a "cooperative basis," a "radical departure" from standard shipbuilding practice to produce, according to its builders, a cruise ship of exceptional luxury and without question the "last word in modernity." [310] As Lescaze recounted to Luhan, Horne's article

> stresses precisely the collaboration of architect and artists, giving just credit to this collaboration for the achievement of a thoroughly unified result. Ships carry the civilization of their country into ports all over the world. Should we not -- like Holland -- give our architects, our engineers and our artists an opportunity to collaborate if we wish our buildings as well as our ships to express the civilization which is ours?[311]

It seems then that in this initial foray into the architectural discourse on collaboration -- a contemporary observer noted that "apparently this idea of closer cooperation is very much in the air at the moment" -- Lescaze held a relatively unbounded view of such relations, that is, a view broadly encompassing architects, artists and other building professionals while employing collaboration, cooperation, and coordination as somewhat synonymous collective action terms.[312] Yet, as he searched in subsequent years for a more refined view of collaboration, rather than turn as one might expect from a modernist architect to the inclusive teamwork model Gropius proffered at the Bauhaus, Lescaze resorted instinctively to the historicist iteration privileging architects and artists over other building occupations.[313] This attention to architects and artists certainly stems from his life-long interest in art but, more significantly, it flows from his own perception of the architect as artist, seemingly a condition precedent to collaboration with other artists. As Lescaze wrote in *On Being an Architect*, his personal recollection of architectural practice:

> Just as the paint-brush in the hands of a painter, these drawings and these specifications are the necessary tools in the hands of the artist called architect . . . there is no real architecture but that which is created, that this is as true of the architecture of the present as it was true of the architectures of the past, and that if we are to have real architecture, the architect must be an artist and the public must demand that he be an artist.[314]

The architect-artist, Lescaze elaborated, is incapable of producing "real architecture" in isolation. Rather he requires from the inception of the design process a "happy combination" of

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[310] George F. Horne, "Nieuw Amsterdam Here in Fast Time," *The New York Times* (May 17, 1938), 25; and George F. Horne, "Dutch Liner Sails on Maiden Voyage," *The New York Times* (10 May 1938), 2

[311] Lescaze, "Open Letter," 3, William Lescaze Papers, Box 58, Syracuse Archives.

[312] H.D., "Toward Getting the Artists Together," *The New York Times* (5 June 1938), 159.

[313] Lescaze acknowledged at the time that, while he was well aware of Gropius, he knew little of the Bauhaus (William Lescaze correspondence to Josef Albers dated 5 May 1937, William Lescaze Papers, Box 59, Syracuse Archives). In his three-page summation of the Bauhaus influence on American architecture, Lescaze made no mention of its teamwork-based pedagogical strategy (unpublished and undated manuscript by William Lescaze, three pages, William Lescaze Papers, Box 56, Syracuse Archives).

[314] Lescaze, *On Being an Architect*, 82.

architect, sculptor, and painter leading to a "real integration and co-ordination."[315] After all, Lescaze asked, why portray painting and sculpture as "allied arts" in the abstract if they are not treated as such in practice? "To be allied implies a unanimity of purpose. A getting to work together, seeing eye to eye, an awareness of each other's resources, and limitations, and a constant aiming together at an ultimate goal."[316] While this idealized affinity with one's allies suggests a certain egalitarian character to this modernist iteration of collaboration -- Lescaze professed to abhor "big brother versus little brother" relations -- upon closer examination we see that Lescaze nonetheless clearly distinguished between the architect-artist and artists of other callings.[317] He encouraged architects to "learn how to collaborate with other allied professional groups" but cautioned that architects must operate with a higher degree of societal responsibility.

> The writer takes his pen, the painter his brush, the sculptor his clay. And they begin, each of them alone with his idea. Not so with the architect. He cannot begin unless there is someone who wants him to begin. Surely, he could make drawings for the pleasure of making drawings, but the most lovely drawings are really not architecture -- they remain drawings.[318]

This echoing of Marianna Griswold Van Rensselaer from a half-century earlier -- "[t]he poet or the painter caters to the public taste; the architect serves the public's express wishes" -- was a critical distinction for Lescaze. That society relied upon the built environment for shelter, work, and play made architecture "above all others the art with which the public should be most directly concerned."[319]

Similarly, Lescaze readily accepted engineers as "natural associates and allies" in a complex field in which challenges and solutions lay far beyond the capacity of individuals or any single profession, yet he insisted that marked differences in capability and educational preparation between architects and engineers made for natural boundaries in practice.[320] The architect, from Lescaze's viewpoint, brought to bear not only design sensibility but a synthesizing ability to provide the "organization" and "unity" critical to architectural production.[321] Once again echoing La Fargian historicist thought, Lescaze relegated the engineer -- "with all the esteem I have for them, all my realization of what a contribution they can make to a building, I have never met one who knew how to plan or what planning was" -- to a secondary role in architectural production.[322] Lescaze relished the story of how his colleague, the architect Ralph Walker, observed:

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[315] Ibid., 89 and 91.

[316] Ibid., 90.

[317] Ibid., 89.

[318] William Lescaze, "Marginal Notes on Architecture," *The Virginia Quarterly Review*, vol. 15, no. 2 (Spring 1939), 275. "The book the writer wrote, the canvass the painter painted -- these may not be read or seen. A building stands for years for people to see and to use" (276).

[319] Marianna Griswold Van Rensselaer, "The Client and Architect," *The North American Review* (September 1890), 319-328, as republished in Lewis Mumford, *Roots of Contemporary Architecture*, 260; and William Lescaze, "Architecture Today," *Twice a Year: A Semi-Annual Journal of Literature, the Arts, and Civil Liberties*, no. 2 (Spring-Summer 1939), 122-123 and 131.

[320] Lescaze, *On Being an Architect*, 200.

[321] Ibid.

[322] Ibid., 194-195.

> I am not making a devil out of the engineer as so many of us do, I merely --from long experience -- appreciate his constant deficiency of imagination, his total lack of interest in the immeasurable factors so necessary to make a civilized society. Their talent is in solving construction problems, which requires no planning.[323]

That engineering arose as a distinct profession from architecture amidst broader tendencies toward specialization was not problematic for Lescaze. Indeed, he recognized and embraced these tendencies, looking to the architect by nature of his education and organizational skills to assume the leadership role amongst the disciplines.[324] In Lescaze's model of collaborative practice, the architect was to be the "symphony conductor" guiding a unified effort toward an integrated outcome in which "every part belongs and contributes to the whole." [325] The painter, the sculptor, and the engineer, according to Lescaze, should all be at the architect's side when "he begins to draw and dream his work, to write his symphony." [326] The architect

> coordinates the progress of their work with his. He must know what they need and in turn he must make them know what he is trying to achieve. Architecture is the result of such an organized and directed collaboration. Tirelessly one must lead, from the beginning of the dream to the tangible realization. . . If it is architecture we want, let the architect lead.[327]

Here Lescaze begins to distinguish amongst collective action terms, marginalizing the cooperation espoused by Kohn as a mere collection of individuals working in tandem, while elevating collaboration to a higher plane of "harmonious" physical outcome, a unified and integrated effort "to the whole." [328] This commonality with historicist thought -- the architect as leader of collaborative undertakings working harmoniously toward an integrated physical outcome of architecture and art -- extends to freely calling upon historical precedent to explicate the collaborative motivation. Much as other modernist architects and critics of the era acknowledged a certain perfection of form in antiquity -- in 1938 Talbot Faulkner Hamlin cited Hitchcock and Le Corbusier as representative of this view -- Lescaze saw no dichotomy in looking to the past for an idealized model of collaboration, seeking to nurture 'the flowering again of the arts and of architecture together expressing more meaningfully our civilization and our aspirations." [329] "Can we look at the Parthenon sculptures or at Cimabue mosaics," he asked, "and fail to see why and how two entirely different examples of perfect integration with architecture were at two different times achieved, and how beautiful they have remained to this day?" [330]

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[323] Ibid., 195.

[324] Lescaze, "Architecture Today," 122-123.

[325] Lescaze, "Open Letter," 2.

[326] Lescaze, *On Being*, 91.

[327] Lescaze, "Marginal Notes," 276.

[328] William Lescaze, unpublished document, "Read before US Senate Committee, 23 May 1957," 2, William Lescaze Papers, Box 65 (Writings), Syracuse Archives; and Lescaze, *On Being*, 90.

[329] Talbot Faulkner Hamlin, "Toward Getting the Arts Together – Need for Cooperation," *The New York Times* (19 June 1938), 135; and William Lescaze, "Thoughts on Arts and Architecture," unpublished memorandum dated 7 October 1965, William Lescaze Papers, Box 55, Syracuse Archives.

[330] William Lescaze, *On Being*, 91-92.

> The Renaissance was a robust font of inspiration for Lescaze, as he imagined friendly groups of craftsmen . . . creating the impression of the culture of their time . . . as a happy and inspiring working condition. It may be now at last the time has come for an integration of our isolated efforts and for the formation of similar friendly groups where ideas and efforts are shared alike in an effort to express the culture of our time.[331]

This romanticization of a pre-industrial past underscores collaboration as a continuum of architectural/artistic output across the ages with variable stylistic output reflective of the times. Clearly, as a self-declared modernist, he sought inspiration not from the stylistic outcome of the past but its mystical "simultaneous creation."[332] While quick to condemn the misappropriation of classical form -- "banks that look like Greek temples, skyscrapers that look like Gothic churches, schools that look like Tudor castles"-- he idealized the collaborative spirit of the past brought forward to the present, thereby enabling modern architecture as a "visible manifestation of a culture" and "an integrated and forceful expression of our civilization."[333]

In this regard, Lescaze's promotion of collaboration comports with his view of architecture as a "social art," one that embraces and embodies in variable forms fluid socio-economic, political, and cultural exigencies.[334] The pervasiveness and rapidity of change in the twentieth century, he observed, mandated innovative ways of thinking about architecture and the exploitation of technology -- he used the term "mechanized tools" -- was essential to architectural production expressive of purpose, supportive of function, and responsive to site.[335] Notwithstanding his anointment of the architect as leader, the magnitude and rapidity of these changes militated against individual action in favor of collaboration, prompting Lescaze to call upon artists to operate together with architects in collaboration as "a greater civilizing force" for societal good than might otherwise be possible behind the veil of specialized disciplinary boundaries.[336]

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[331] William Lescaze correspondence to Warren H. Radford dated 18 June 1941, William Lescaze Papers, Box 59, Syracuse Archives.

[332] William Lescaze, "Read before US Senate Committee, 23 May 1957," 3, Lescaze Collection, Box 65 (Writings), Syracuse; and William Lescaze, "America is Outgrowing Imitation Greek Architecture, an address to the 28th Annual Convention of the American Federation of Arts, assembled in Washington, D.C., May 11, 12, 13, 1937," printed material in William Lescaze Papers, Box 62, Syracuse Archives. In his AFA address, Lescaze observes that "American has definitely outgrown the imitation of Greek or Italian architecture. America is quite capable of developing its own architecture" (first page). This contradicts La Farge's arguments in favor of Bacon's design for the Lincoln Memorial (La Farge, "Lincoln and Compulsory Greek").

[333] Lescaze, "The Meaning of Modern Architecture," *North American Review*, vol. 244, no. 1 (Autumn 1937), 114; Lescaze correspondence to Radford; and Lescaze, "Read before US Senate," 3.

[334] Lescaze, "The Meaning of Modern Architecture," 110.

[335] William Lescaze, "The Classic of Tomorrow," *American Architect*, vol 147, no. 2640 (December 1935), 11; and William Lescaze, "A Modern Housing for a Museum," *Parnassus*, vol. 9, no. 6 (November 1937), 13.

[336] William Lescaze, unpaginated typescript of lecture to "Lantern Club" at Exeter, 10 November 1955, third page, William Lescaze Papers, Box 65, Syracuse Archives. Lescaze nonetheless remained concerned about the undue influence of individualistic behavior. "Men live together, work together. In cities, in suburbs, on farms. There are bankers, lawyers, real estate men, public officials, clients, contractors, and many others among them. And architects, too. Put some of them around a conference table. Every one of them, when has to work out a problem in collaboration with all the others, is jealous of his own prerogatives, of his own specialized knowledge. Every one's first effort seems to be not so much to contribute his knowledge to the solution of the problem but rather to impress all the others with the overwhelming importance of the contribution that he can make" (Lescaze, *On Being*, 104-105).

This view of architecture as social art also encompasses -- consistent with an early modernist agenda -- an image of the profession in service to society, "to serve man, to be in scale with man, to provide for the comfort of man -- light and air for his dwellings, for his working place, for his recreation."[337] Society, Lescaze broadly observed, consistently fails to grasp this notion, in the mistaken belief that architects have little to "contribute besides drawings."[338] Architecture, he insisted, is a service profession for societal good no less than the iconic professions of medicine and law, a "service by which people obtain advice -- to build or not to build, to buy or not to buy, to improve or not to improve; or designs and drawings from which to get costs, from which to build; or supervision, to verify that value is received for money spent. Architecture is a profession, part art, part business, which renders a service."[339]

PWA and the Williamsburg Houses

This advocacy by Kohn and Lescaze of architecture as a service profession corresponded with public sector employment opportunities spawned by New Deal programs, most notably the Federal Emergency Administration of Public Works initiated in 1933 by incoming President Franklin D. Roosevelt in response to a massive surge in unemployment. Their advocacy, furthermore, ensured that both men were well-positioned to participate in the opportunities arising from the New Deal. Lescaze's rapid rise to prominence with the PSFS building and exhibits at the Museum of Modern Art enhanced both his public stature and professional contacts. His interest in housing came to the attention of government officials with a low-rise design -- attributed officially to his partnership with Howe -- for the Chrystie-Forsyth housing project (1931-32) and a prototype high-rise solution for River Gardens (1931-33), both of which remained unbuilt due to the economic uncertainties of private development in New York City and elsewhere.[340]

For Kohn, his participation in previous federal interventions into the housing market during the First World War as housing director for the Emergency Fleet Corporation (EFC) established his reputation as an authority in this realm. The EFC, funded by a fifty million dollar appropriation by Congress under the Shipbuilders' Act signed by Woodrow Wilson in March 1918, along with its sister entity, the United States Housing Corporation, prompted a wave of architectural practitioners entering into government employment.[341] Kohn, already serving with Whitaker, Bing, and Ackerman on a Committee on New Industrial Towns, became director of production for the EFC Housing Division. Ackerman -- having previously prepared a study of British industrial towns for the Council of National Defense and AIA -- assumed a lead role in the Department of Design, while Henry Wright served as assistant to the director of town

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[337] William Lescaze, "The Classic of Tomorrow," 11.

[338] William Lescaze, *On Being,* 124.

[339] Ibid., 209.

[340] A model of the Chrystie-Forsyth project was on display at the Museum of Modern Art when Lescaze and Howe resigned from the Architectural League ("Architects' Show Bars Two Moderns," *The New York Times* (28 February 1932), 1).

[341] After initial government action to "commandeer boarding houses, hotels, apartments, and even private homes," the Emergency Fleet Corporation pursued a strategy to actively develop housing communities in support of America's shipbuilding enterprises ("Fleet Corporation to Seize Houses," *The New York Times* (2 March 1918), page unknown.

planning, B. A. Halderman. [342] While Kohn's time with the EFC was short-lived -- with the cessation of hostilities in November 1918, both federally-supported housing programs came to a close and efforts initiated to sell developed properties to the private sector -- the experience demonstrated to Kohn, as Spann notes, the "value and the feasibility of cooperative action among engineers, architects, and others involved in the construction of housing." [343]

Kohn's subsequent appointment in 1933 as head of the Housing Division of the PWA under Secretary of the Interior Harold Ickes was a renewed opportunity to implement his notions of cooperation and interrelations on a vast scale and to put the test his faith in the federal government as a transformative instrument in the time of crisis. While his earlier EFC undertaking evidenced the value of "intimate co-operation of all the factors in building production,"as Kohn recalled, the pressing socio-economic conditions of the Depression mandated "even closer co-operation" amongst building professionals in "organizations in which men of varying qualifications co-operate figuratively as equals." [344]

Bureaucratic challenges and controversy, however, quickly undermined Kohn's cooperative ideal. As Alexander von Hoffman explains, the PWA Housing Division suffered from several systemic problems. First, Ickes offered limited staff resources, perhaps attributable to his reluctance to insert the government too rapidly into the business of housing production. Secondly, relatively few cities expressed interest in the federal housing effort, compounded by a complicated array of laws mandating the formation of public housing corporations. Kohn sought to alleviate these obstacles by traveling extensively to promote the PWA program, while Ickes endeavored to put the PWA directly into land acquisition and housing production through its own housing corporation, a move halted on legal grounds and resistance by local officials to a perceived federal "invasion." [345] These considerable obstacles, coupled with contentious

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[342] "Freeing War Towns from Speculators," *The New York Times* (9 June 1918); and *Handbook of Economic Agencies of the War of 1917* (Washington, D.C.: United States General Staff, Historical Branch, 1919), 357; and Richard M. Candee and Greer Hardwicke, "Early Twentieth-Century Reform Housing by Kilham and Hopkins, Architects of Boston," *Winterthur Portfolio*, vol. 22, no. 1 (1987), 64. Ackerman described himself as "Chief of Housing & Town Planning Design for US Shipping Board Emergency Fleet Corporation" ("Biographical Notes, Frederick L. Ackerman," NYCHA Collection). Bing, Stein, Kohn, Purdy, Ackerman, Haig, and Whitaker along with Richard S. Childs, Robert E. Simon, Graham R. Taylor, and Herbert S. Swann oversaw preparation of a report on land values in New York City (G. B. L. Arner, "Land Values in New York City," *Quarterly Journal of Economics* (August 1922), 545-580).

[343] Spann, 15; and Candee and Hardwicke, 65. Kohn's optimism about cooperation after this experience differed from that of La Farge, who, in this period, was one of two "assistant general managers" of the United States Housing Corporation, a component of the Federal Bureau of Industrial Housing and Transportation operating under the auspices of the Secretary of Labor (Otto M. Eidlitz, Director, *Report of the United States Housing Corporation, December 3, 1918* (Washington, D.C.: Government Printing Office, 1919), 25). La Farge felt that the teamwork arrangements in evidence at the USHB were suitable for emergency conditions but in the private sector "no such uniting of the forces may be anticipated." (C. Grant La Farge, "Government Housing; What Will Follow?" *AABN* (January 8, 1919), 58). With Lewis Mumford, Benton Mackaye, Stein, Whitaker, Bing, and Ackerman (and subsequently Catherine Bauer), Kohn formed the Regional Planning Association of America (1923-1933) in Kohn's offices for the purpose of promoting "the study of housing, industrial decentralization, city planning and regional planning" (Spann, 42). Kohn, as Spann notes, "played only a quiet role" in the group but maintained close working relationships with its founders (144).

[344] Kohn, "Architect Function," 294-295.

[345] "A New City Landlord," *The New York Times* (28 June 1934), 22.

discussions over site acquisitions and authority, fueled increasing skepticism of federal intervention in the housing sector.[346]

Despite these unfavorable conditions, Kohn seemed optimistic when addressing the Ethical Culture Society in New York in May 1934, the same year federal housing projects finally reached implementation. He expressed confidence of the imminent emergence of a "new democracy; in a larger sense than the economic one alone, for it is to be a democracy of spiritual forces. There is to be a New Deal and it will consist largely in a new inclusion and understanding of the worth of 'the other man.'

> We cannot ever achieve this if every one is to fight alone for his own interest or those of his narrow class or group. We can accomplish good for all the people only as every man care for the larger interests even of his own group; which are inseparable from the interests of many others; as he comes to understand clearly the interests of many groups, sees their interconnection, and helps to make the interrelatedness effective for the material and spiritual advantage of all.[347]

Kohn was ultimately unable to reconcile his deep commitment to cooperation and interrelatedness of action with the multiplicity of PWA stakeholders, burdensome bureaucratic procedures, inflexibility of action, and conflicting interests. Ackerman, who joined the Housing Division as a consultant at Kohn's urging, resigned from the PWA in March 1934 after finding "his own public ideal of government planning" premised on technocratic principles compromised by the political realities of governing.[348] In June 1934, a month after his speech to the Ethical Society, Kohn also resigned from the PWA amidst a wave of personnel changes triggered by a controversial and highly publicized investigation into "loose business methods"

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[346] Alexander von Hoffman, "The End of the Dream: The Political Struggle of America's Public Housers," *Journal of Planning History*, volume 4, no. 3 (2005), 230-232.

[347] Robert D. Kohn, "Our Share in the Work Ahead," *The Standard*, volume 21, no. 1 (October 1934), 5.

[348] Spann, 16. Ackerman was an active participant in the technocratic movement intent on a re-structuring of democratic society premised on expertise and scientific engineering rather than political ideology or self-interest. In his own words, Ackerman describes the methodologies of the movement: "We will work toward this end by following means: 1. Perfect a technical plan by which the American community will continue to function as a whole when the present institutions have become completely inoperative. 2. Establish as rapidly as possible a practicable working organization in every functional division and sub-division of the continent which will educate the community to a new type of enlightened self-interest and guide it through the period of transition into a more stable order." ("Purpose of the Continental Committee on Technocracy," in Frederick L. Ackerman, F.A.I.A., *The Facts Behind Technocracy*, undated booklet (Continental Committee on Technocracy), #3600, Box 18, Cornell Archives). As Akin notes in his study of the movement: "Although a far cry from a mass organization, the Technical Alliance did consist of an impressive cadre of technical experts. Scott headed the staff, holding the self-bestowed title of 'Chief Engineer.' The prospectus listed an organizing committee composed of many of the country's most esteemed 'technicians.' Charles Steinmetz, the socialist head of General Electric's research laboratory, who saw the modern industrial corporation as the model for a new collectivist society, was the most prominent of the members. The list included others who ranked near the top of their fields: chemist Carl C. Alsberg, who predicted that science could procure enough food to feed an infinite population; Richard C. Tolman, who later became dean of physics at California Institute of Technology; Allen Carpenter and John C. Vaughn, physicians; Frederick L. Ackerman, New York architect and city planner; Robert D. Kohn, also an architect; electrical engineers Bassett Jones and L. K. Comstock; Charles H. Whitaker, editor of the AIA Journal; Leland Olds, statistician; Benton MacKaye, a forester with the federal government; Alice Barrow, deputy director of the Dept. of Education; and Veblen, whom Scott listed as an educator." (William E. Akin, *Technocracy and the American Dream* (Berkeley: University of California Press, 1977), 34-35.)

with regard to land valuations and fees.[349] As one government employee portrayed the situation, "the theoretical school came up against the hard-boiled proposition of evaluating land." [350]

Despite the seemingly insurmountable obstacles, federal investment in projects under Kohn's watch commenced in 1934, most notably with the Williamsburg Houses development in New York City (Images 9 and 10). As the first housing project in New York to be funded from federal sources, Williamsburg faced exhaustive scrutiny from all quarters -- political, professional, and business -- as a critical test of "the whole validity of the housing movement in New York." [351] Lescaze, one of the project architects, promised Mayor Fiorello La Guardia that Williamsburg would be "the best demonstration of intelligent and successful modern, low-cost housing in America." [352] It was, if nothing else, a critical test of the potentiality of the modernist social agenda in an American context, a field of contention between competing aesthetic programs to fulfill that agenda, and, as Plunz notes, a measure of "design sensibility" in government-funded housing production. [353] Of interest here is that, although portrayed in a June 2003 landmark assessment report as a "collaborative project" amongst the PWA, the local housing agency, and a group architects including Lescaze, the actual organizational structure of the project, as I shall show, bore little resemblance to twenty-first century notions of collaboration.[354]

Collective action on Williamsburg may be dated to the autumn of 1933 when, at the prompting of Kohn as PWA housing director, prominent New York City residents, activists, businessmen, and city officials gathered as a non-profit Slum Clearance Committee -- with the directorship held by Kohn's colleague Shreve -- tasked with documenting urban decay in New

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[349] "Director of Housing Aid Quits Post," *Los Angeles Times* (14 June 1934), 1; and "Kohn Quits in PWA Quiz on Housing Loans, Fees," *The Washington Post* (14 June 1934), 1. Ickes promptly replaced Kohn with Col. Horatio B. Hackett, an architect in the Chicago office of Holabird & Root and general manager of the Public Works Emergency Housing Corporation (Al Chase, "Col. Hackett to Head Housing Division of PWA," *Chicago Daily Tribune* (15 June 1934), 7; and "Senate Committee Votes Housing Bill," *The New York Times* (15 June 1934), 9.

[350] "Nine Lose Posts," *The Washington Post* (17 June 1934), 1.

[351] Talbot Faulkner Hamlin, "New York Housing: Harlem River Homes and Williamsburg Houses," *Architectural Forum*, vol. 19 (May 1938), 281. "Thus, the Municipal Housing Authorities Law represents the third phase of governmental effort at slum clearance. Private enterprise is rejected and the government itself, through the agency of this Authority, steps in, exercises the power of eminent domain, condemns land and erects model houses for wage-earners and other persons in the low income groups. In NYC, there projects have developed under the Municipal Housing Authorities Law. These are the First Houses at Avenue A and 3rd Street in Manhattan, the Harlem River Houses, now under construction at Harlem River and West 151st Street, and the Williamsburg Housing Development at Maujer Street, Bushwick Avenue, Scholes and Leonard Streets in Brooklyn…The Williamsburg Development is the first slum clearance and low rental housing project initiated by the NYCHA and financed by federal money." (William Karlin, "New York Slum Clearance and the Law," *Political Science Quarterly*, vol. 52, no. 2 (June 1937), 246).

[352] William Lescaze correspondence to The Hon. F. La Guardia dated 29 July 1935, 1, Box 53B7, Folder 10, NYCHA Collection.

[353] For an elaboration of these points, see Plunz, 219.

[354] *Landmarks Preservation Commission Report on Williamsburg Houses*, Designation List 348, LP-2135 (24 June 2003), 1.

York.[355] The culmination of the committee's efforts was approval from Kohn's Housing Division for twenty five million dollars to formulate an agency -- the New York City Housing Authority (NYCHA) -- for the purpose of administering "slum clearance and low-cost housing in New York City."[356] The NYCHA retained Lescaze, along with Shreve, James F. Bly, Matthew W. Del Gaudio, and Arthur C. Holden as an "Executive Board of Architects" with the bipartite task of representing the authority as it broadly pertained to "various low-cost housing and slum clearance projects," and to oversee architects selected by "competition to perform architectural services in connection with the funds allocated by the PWA."[357] The NYCHA, furthermore, separately retained Ackerman -- after he departed Kohn's PWA Housing Division -- as technical director, to "advise the NYCHA on matters of general policy," including overseeing "the preparation of designs, plans and specifications for the construction of housing to replace tenements."[358] Ackerman was additionally to organize and administer the mandated competition, the outcome of which was the selection of twenty-two architects including Stein, Paul Trapani, and Charles F. Fuller to receive commissions for housing projects to be implemented under the direction of Lescaze and fellow Executive Board members.[359]

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[355] R. H. Shreve correspondence to Dean George Young, Jr. on letterhead of Slum Clearance Committee of New York dated 4 September 1934, 15/1/512, Box 11, Cornell Archives. "Mr. R. D. Kohn of the Federal Emergency Housing Corporation called together interested parties in New York representing government,, social, real estate, and technical agencies, and from this grew the Slum Clearance Committee of New York, with R. H,. Shreve as its director. Committee members included: R. G. Wagenet (secretary), Alexander M. Bing, James Cummings Bonbright (Columbia University), Richard S. Childs (chairman), Morris Leopold Ernst, Darwin Rush James (pres. East River Savings Bank), Orrin G. Lester (VP Bowery Savings Bank), George McAnemy (Title Guarantee), Joseph D. McGoldrick (Deputy Controller), Rev. Edward Roberts Moore (Catholic Charities), Langdon W. Post (Commissioner, Tenement Housing Dept), Ira S. Robbins, Mrs. Mary Kingsbury Simkhovitch (Greenwich House), Carl S. Stern. (Provost Albert R. Mann correspondence dated 5 May 1934, 15/1/512, Box 11, Cornell Archives).

[356] "New York City Housing Authority, Memorandum No. 1 dated 24 March 1934 to Housing Division, Public Works Administration and the PWA Emergency Housing Corporation," 1, NYCHA Collection.

[357] Contract dated 1 June 1934 between New York City Housing Authority and Shreve, Bly, Del Gaudio, Holden, and Lescaze, annotated in top left corner "CJS.K 10/29/34"; and Revision of Preamble dated 1 November 1934, NYCHA Collection.

[358] Spann, 178; and Wilfred S. Lewis correspondence to Langdon W. Post dated 8 December 1934, NYCHA Collection. In one of his many communications with administrators at Cornell University, Shreve alerted Young that the "Housing Authority" had "engaged Ackerman as its 'Secretary,' this officer under the law being its executive director" (R. H. Shreve correspondence to Dean George Young, Jr. dated 8 March 1934, 15/1/512, Box 11, Cornell Archives). Shreve also portrayed Ackerman as the "best man to give you a general review of the Low-Cost Housing situation" (R. H. Shreve correspondence to Dean George Young, Jr. dated 26 February 1934, 15.1.512, Box 11, Cornell Archives). Ackerman on modernism: "It would be gratuitous, if not stupid, to oppose or hamper those who seek something new in art and architecture. But in this connection it should be pointed out that if the desire for change springs from the same source as the desire which gives rise to changing fashions, that is to say, if its is a desire lunched under the auspices of pecuniary canons of taste, then that would take place in response to the demand that merely affect the surface of things. And on the other hand, if the demand for changes springs from a desire to express modern functions and expose modern industrial processes, then certain important consequences would accrue with the satisfaction of that demand." (Frederick L. Ackerman, "Modern Architecture," *AIA Journal*, vol. 16, no. 11 (November 1928), 415).

[359] In June 1934, NYCHA executed a contract with Shreve, Lescaze, and others, referred collectively as Architect. Provisions in the contract called for: "Executive control shall be vested in the Executive Board acting through its Chairman. Professional services shall be allocated as between the Executive Board and the project architects. Since all architects selected by the competition cannot be employed simultaneously, each architect is guaranteed an equal share. Fees shall be divided amongst architects in proportion to services provided." ("Contract," NYCHA Collection).

It seems, however, that the Executive Board, with Shreve in his familiar role as chairman, had other intentions, moving unilaterally to alter the prescribed arrangement by granting themselves the task of designing the 1,600-unit Williamsburg project and establishing "their own arrangements with the competition architects as they see fit."[360] NYCHA staff objected strenuously to the proposed modifications, pointedly reminding Executive Board members that their appointments were based not on design ability but rather their "business or executive capacity," and that the PWA -- a "suspicious organization" -- would not look favorably upon such an arrangement. Resolution of the conflict necessitated the crafting of an agreement between Langdon Post of the NYCHA and Shreve that transformed the Executive Board, supplemented by several so-called "competition architects," into a "co-partnership" to undertake the Williamsburg commission in exchange for relinquishing the original pivotal assignment to oversee the entire NYCHA portfolio of housing projects.[361]

Aside from the certainty that Shreve would serve as Chief Architect, little else was clear amongst Lescaze, the executive architects, competition architects, and the NYCHA.[362] It was only after a protracted period of tense and often whimsical negotiations over organizational structure, voting rights, and compensation formula that the parties agreed to a "co-partnership agreement" amongst the architects, a service agreement with NYCHA, and separate consulting

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[360] Wilfred Lewis, secretary of NYCHA, reported to Langdon Post in October 1934 that the Executive Board had prepared a contract with NYCHA for preliminary and working drawings (without mentioning the competition architects) and that the Executive Board wanted to make its own arrangements with the competition architects. Lewis objected to this arrangement on the premise that the competition architects were selected for their design ability, whereas the Executive Board architects were selected for their "business or executive capacity" (Wilfred S. Lewis correspondence to Langdon W. Post dated 30 October 1934, 1, Box 53A4, Folder 7, NYCHA Collection).

[361] Lewis suggested that the competition architects have just one contract as a group with the Authority. "It should be remembered that the PWA is a suspicious organization which will jump at any opportunity to object to the proceedings of the Authority. I believe the PWA would be justified in objecting to any plan which relegates the architects chosen from the whole profession by competition to the position of employes (sp) of a group of architects whose selection at best was not based on any such broad grounds" (Lewis correspondence to Post dated 30 October 1934, 1). Post insisted that the Authority would "deem it a privilege" if Shreve and the other Board members accept the offer to take on the Williamsburg commission (Langdon W. Post correspondence to R. H. Shreve dated 14 February 1935; and R. H. Shreve correspondence to Langdon W. Post dated 5 February 1935, NYCHA Collection). For a 1931 *Architectural Record* article on compensation for architecture services, Kohn and Shreve discussed fee structure at great length. "Mr. Kohn believes that for most work the cost-plus fee is the best basis for payment. He points out that an architect can give more time to the study of a project when it is on this basis than on a percentage or straight-fee basis." He described using the AIA standard form Owner-Architect agreement with some modifications and additions in much of his work, but used a cost plus fee arrangement on the Ethical Culture School project in partnership with Stein. Shreve took the following stance on compensation: "This firm believes that for large buildings the architect should receive a flat fee for his work. They feel that a fixed percentage for architectural work, regardless of the type of job, is not a satisfactory method of procedure, that the architect who demands a flat percentage contract before making a study of the client's problem frequently loses an opportunity of developing real business. They prefer to have a conference of the members of the firm to consider all the requirements of the prospective job, analyze drafting and overhead costs of similar jobs, and arrive at a definite cost budget for the job at hand." ("Architect's Fee in Getting Business," *The Architectural Record* (May 1931), 423-424.

[362] R. H. Shreve correspondence dated 21 February 1935 to Langdon W. Post, NYCHA Collection.

agreements for engineering and landscape architectural consultants operating under the direction of Lescaze and the other architects.[363]

That the organization of Williamsburg -- initially envisioned as a broadly inclusive arrangement by way of Ackerman's competition -- should morph into a normative hierarchical enterprise is, upon close inspection, not at all inconsistent with Lescaze's view of collaboration. Although his published correspondence with Mabel Dodge Luhan occurred after the completion of Williamsburg in 1938, the project organization, as untidy as it might seem, nonetheless followed his modernist re-formulation of the La Fargian historicist model: the architect as leader of the organization, holding responsibility for coordinating the work of specialists relegated to a secondary position, each ensuring they are attuned to the architect's needs, and, as Lescaze so confidently declared, architecture as "the result of such an organized and directed collaboration."[364] Moreover, while Shreve's own published stance on collaboration suggests a horizontal model of collaboration allowing for shared decision-making -- "[l]ocation, use, character of space and time of building must be decided right the first time, and in these decisions the architect collaborates, he does not control" -- his actual mode of practice held strictly to the sort of hierarchical structure employed at Williamsburg. Indeed, in a posthumous survey of Shreve's career, landscape architect Gilmore Clarke cast Shreve as a forceful "acknowledged leader," a view he did not find incompatible with Shreve as "an outstanding

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[363] The partnership agreement for laid out explicit voting procedures, with all issues resolved by "majority vote" of the partnership" (paragraph 2). Agreement page 2 - "Partners voting ~~15~~ (17) or more votes as aforesaid shall constitute a quorum and a majority of the votes of the parties hereto shall be construed to mean the affirmative vote by partners whose votes total ~~15~~ (17) or more" (paragraph 3). "Expenses and losses born as follows: Shreve (12%), Bly (12%), Del Gaudio (12%), Lescaze (12%), Holden (12%), Others (8%) (Paragraph 6). Partners included Shreve, James F. Bly, Matthew W. Del Gaudio,[363] Arthur C. Holden of Holden, McLaughlin & Associates, William Lescaze, Samuel Gardstein of Holmgren, Voltz & Gardstein, Paul Trapani, John W. Ingle, Jr., G. Harmon Gurney of Gurney & Claven, Harry Leslie Walker. Shreve through Lescaze had 3 votes each, Gardstein through Walker had 2 votes each ("Williamsburg Project Associated Architects Partnership Agreement," NYCHA Collection). Fees and voting rights were not evenly distributed, with the original Executive Board architects – Shreve, Lescaze, Holden, Del Gaudio, and Bly – receiving sixty percent while the competition architects – Trapani, Ingle, Gurney, Walker, and Gardstein collectively received the balance. Liability for expenses and losses followed suit. The architects were unable to agree amongst themselves, as required by the NYCHA, on designating an "Assistant Chief Architect," choosing instead to defer the matter for Shreve to act upon at a later date based on a majority vote of the architects. (R. H. Shreve correspondence to Langdon W. Post dated 6 July 1935, NYCHA Collection). The contractual arrangement and compensation for landscape architectural services was another stumbling point, as was a NYCHA requirement that the names of all associated architects, engineers, and the landscape architect appear on the front door of the co-partnership offices, a suggestion the architects found "rather absurd." The NYCHA subsequently agreed to drop the requirement for the engineers and landscape architect, each of whom served as sub-consultants to the co-partnership of architects. (R. H. Shreve correspondence to Langdon W. Post dated 5 and 6 July 1935; R. H. Shreve correspondence to Langdon W. Post dated 17 June 1935; Langdon W. Post correspondence to R. H. Shreve dated 21 June 1935, NYCHA Collection).

[364] Lescaze, "Marginal Notes," 275-276. As to practicing according to one's "individual convictions rather than the convictions of the group," an assertion he made when resigning from the Architectural League, the only evidence of such independence at Williamsburg was correspondence Lescaze sent to Mayor La Guardia outside of the communications protocol established for the project that protesting an NYCHA objection to one of his site planning decisions. "Williamsburg is an original and modern plan," Lescaze insisted in his letter. "It not only gives to over 6000 people more air, more light, more interesting vista than the usual standard site plan, but it makes architectural expression fit the lives of these people instead of forcing their lives into an arbitrary architecture. ("William Lescaze correspondence to The Hon. F. La Guardia dated 29 July 1935, 1, Box 53B7, Folder 10; and "Official Communication," City of New York, Office of the Mayor, dated 7 August 1935 "urging relocating and re-designing of PS 49 which has been placed in the "middle of the housing development' in Williamsburg," Box 53B7, Folder 10, NYCHA Collection).

collaborator."[365] While Shreve held aloft the architect as "the leader in his art, -- the coördinator of constructive forces, the master of his craft," he acknowledged that the economic and technological complexities of building construction -- not to mention technical expertise now firmly in the hands of engineers and builders -- warranted a more nuanced leadership role for the architect "as part of an organization, -- not as a despot."[366] Shreve nevertheless insisted that this did not "belittle the architect or lessen his influence" -- and here we see some commonality with Kohn -- "on the contrary, it brings him into a correct relation to those with whom he is working, places responsibility and authority where they belong, and strengthens the position of each man in the work for which he is responsible."[367]

Upon completion, Williamsburg -- its "mechanical regularity, modified by a consciously sought complexity" -- opened to mixed reviews.[368] A Museum of Modern Art exhibition catalogue in 1939 touted the project as an "oasis of open space and comfortable orderly buildings in the middle of a blighted slum."[369] Lewis Mumford saw Williamsburg in an entirely different light, criticizing its "able gentlemen" architects for "a complicated type of plan that wastes space and provides inadequate, half-lighted kitchens."[370] T. F. Hamlin fretted instead over its "bad, or ill-considered" construction quality despite the assemblage of "good architects," "most reputable contractors," and "the best engineers," observing just one year after its completion that the masonry "is blotched and discolored by leaks and dripping; the general appearance is shocking."[371]

New York World's Fair of 1939-40

Well before Hamlin's observation, though, the architects responsible in one way or another for the realization of Williamsburg had already turned their attention toward another collective enterprise: the New York World's Fair of 1939-40. Indeed, the contingent of architects engaged on the Fair was a microcosm of the overlapping circles of collegial relations of our two protagonists. Lescaze designed temporary pavilions, Kohn and Shreve both took positions on the Board of Design, and fellow Williamsburg architect Matthew Del Gaudio was responsible for a food exhibition building containing a vast circular hall dedicated to advancements in food technology.[372] Another Williamsburg architect, Arthur Holden, also participated in the Fair, as did Lescaze's colleague Ralph T. Walker, Shreve's business partner William Lamb, and Kohn's colleagues Stein and Butler, the latter two cited as "collaborators" on an official roster of

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[365] R. H. Shreve, "The Empire State Building Organization," *The Architectural Forum*, vol. LII, no. 6 (June 1930), 772; and Gilmore D. Clarke, "Richmond Harold Shreve, 1877-1946," Cornell University College of Architecture alumni letter, May 1947, 15/1/512, Cornell Archives.

[366] Shreve, "Empire State," 771.

[367] Ibid.

[368] Hamlin, "New York Housing," 286.

[369] Plunz, 219-220.

[370] Mumford, "Houses and Fairs," in Wojtowicz, *Sidewalk Critic*, 159.

[371] Hamlin, "New York Housing," 286. Overlooked in these journalistic accounts of Williamsburg was any sort of dialogue with those displaced by its development or with prospective residents, an iteration of collaboration that would surface several decades later in what was broadly known as community design. For a history of community design, see Mary Comerio, "Community Design: Idealism and Entrepreneurship," *Journal of Architectural and Planning Research* (1984), 227-243.

[372] "2 New Fair Units to Cost $575,000," *The New York Times* (9 July 1937), 40.

contributors to the Fair.[373] Literature on the 1939 Fair is vast, drawn from extensive archival material presciently preserved by its organizers -- Kohn imagined a permanent institution devoted to its brief history -- and from diverse perspectives on its organization, development process, outcome, and significance. [374] Peter Kuznick writes of fears within the scientific community in the late 1930s that a promotional emphasis on "gadgets, commodities, and magic" at the future-themed Fair might diminish rather than enhance public recognition of the critical role of science in everyday life.[375] In a comparative analysis of New Urbanism, A. Joan Saab suggests that "the Fair embodied a lasting utopian vision of the United States, premised on advanced technology and a powerful consumption-based economy." [376] More recently, Pieter van Wesemael observes that the Fair "reflected the transformation within Western economics from heavy to light industry and the shift in focus from goods to services." [377]

Here I briefly consider the Fair from yet another perspective, that of tensions between collaboration and cooperation. While often used synonymously in architectural discourse past and present, at the Fair these terms embodied competing idealizations of collective action. The outcome was a contentious episode of polemics over the mission and attributes of a fair -- economic, political, aesthetic, educational, transformative, retrospective, forward-thinking -- leading to a negotiated yet not quite reconciled state of cooperation/collaboration amongst a diverse array of stakeholders. These unreconciled tensions between collaboration and cooperation, as we shall see, are most evident in the initial efforts to articulate the identity and mission of the Fair, and secondly, in its implementation and physical manifestation.

The episode begins in May 1935, when influential local politician George McAneny assembled a steering committee to explore the viability of a world's exposition for New York City.[378] Its founding objective was relatively unremarkable: the showcasing of advancements in American technology and services, a theme consistent with author Ed Tyng's mid-century assessment that the principle motivation behind such expositions is

> to bring about an improvement in business and trade. . . They are designed to advertise to the whole world the nation, state and city in which they are held; to give the throngs who

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[373] Ibid. Lamb's participation was by way of his firm, Shreve Lamb and Harmon, which received the commission to design a pavilion dedicated to the promotion of Johns-Manville products (Biographical sketch, November 1945, 45, 15/1/512, Cornell Archives.)

[374] Pieter van Wesemael, *Architecture of Instruction and Delight: A socio-historical analysis of World Exhibitions as a didactic phenomenon, 1798-1851-1970* (Rotterdam: 010 Publishers, 2001), note 216, 799. For detailed accounts of the development of the Fair, see, in addition to Wesemael, Francis Edmonds Tyng, *Making a World's Fair: Organization, Promotion, Financing, and Problems, with Particular Reference to the New York World's Fair of 1939-40* (New York: Vantage Press, 1958); and Helen Harrison, ed., *Dawn of a New Day: The New York World's Fair, 1939/40* (New York: New York University Press, 1980.

[375] Peter J. Kuznick, "Losing the World of Tomorrow: The Battle over the Presentation of Science at the 1939 New York World's Fair," *American Quarterly*, vol. 46, no. 3 (September 1994), 341-373.

[376] A. Joan Saab, "Historical Amnesia: New Urbanism and the City of Tomorrow," *Journal of Planning History*, vol. 6, no. 3 (August 2007), 191-213.

[377] van Wesemael, 445.

[378] Other committee members included banker Henry Bruere, jurist William Church Osborn who chaired the Citizens' Budget Commission, former ambassador Nicholas Roosevelt, Grover A. Whalen, and Percy Strauss, director of R. H. Macy & Co. (van Wesemael, note 25, 782).

visit them an understanding and a consciousness of new developments and improvements in accepted things in everyday use.[379]

Against a background of federal intervention to revive a moribund economy, organizers confidently predicted that public/private investment in the Fair would stimulate the local and national economy, and spark sizable contributions to city charity and relief programs from the proceeds of Fair operations.[380] With public expressions of "cooperation" from Mayor Fiorello La Guardia, tentative agreements on land and infrastructure with New York City Parks Commissioner Robert Moses, and a letter of support from Franklin D. Roosevelt, the steering committee enthusiastically forged ahead with formation of a Fair Corporation and plans for an "American" or "Liberty Exposition" timed to coincide with the one-hundred-fiftieth anniversary of George Washington's presidential inauguration.[381]

Competing plans for the Fair surfaced soon thereafter amidst prolonged polemics carried out in the media and lecture circuits, with each plan bearing fundamentally different motivations and collective action strategies from those of Fair organizers. The more prominent alternative was put forth by an assemblage of progressive architects and artists gathered by Municipal Art League secretary Michael Meredith Hare, Kohn's fellow RPAA founders Lewis Mumford and Henry Wright, architects Harvey Wiley Corbett, I. Woodner Silverman, and Albert Mayer, and industrial designers Walter Dorwin Teague and Gilbert Rohde.[382] Rather than a formulaic exhibition of business and industrial methodologies along strict classificatory lines as put forth by McAneny's Fair Corporation, Hare's group -- the Fair of the Future Committee -- proposed a more provocative didactic and integrated initiative delving into the "social consequences" of technological development, with an emphasis on the interconnectivity of socio-economic, political, and environmental matters.[383]

"Society is bored with the machine as such, and frightened of its productivity," Fair of the Future committee member Albert Mayer explained. "The significant point that a modern fair must dramatize is the life of man, the stirring and freeing effect that the properly grasped and coordinated possibilities of technology and science could exercise on life."[384] Another contemporary observer remarked that the New York fair had to contend not only with concurrent

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[379] Tyng, 11-12.

[380] Ibid.; and "Great World Fair for City in 1939 on Site in Queens," *The New York Times* (September 23, 1935) 1. "The Fair was the result of a close and complex collaboration between private investors and local, state, federal and foreign governments, with NYC donating $26.7 million, the federal government $3 million, New York State $6.2 million, and foreign governments over $30 million" ("Historical Note," New York World's Fair 1939 and 1940 Incorporated Records, 1935-1945, MssCol 2233, The New York Public Library, Manuscripts and Archives Division).

[381] Tyng, 14.

[382] "Fair Planners Selected," *The New York Times* (December 12, 1935), 33; and "Rival Art Groups Battle Over Fair," *The New York Times* (March 1, 1936), section 2, N1. For a discussion of the RPAA, see the previously cited Spann, *Designing Modern America: The Regional Planning Association and its Members*, Columbus: Ohio State University Press (1996). Hyungmin Pai notes that Kohn and Wright, along with RPAA founders Frederick Ackerman, Clarence Stein, and Charles Whitaker, were "all a generation older than Mumford" (Pai, 118).

[383] *The Fair of the Future 1939, a Proposal submitted by the Committee Formed at the Dinner at the City Club, Wednesday, December 11, 1935; Amended February 10, 1936,* 2; as cited in Eugene A. Santomasso, "The 1939 New York World's Fair Three Years Before: Controversy and Architectural Competition," *Arts Magazine*, vol. 52, no. 3 (November 1977), 108.

[384] "Seeking A New Pattern for A World's Fair," *The New York Times* (12 July 1936), SM21.

expositions for the public's attention -- the Golden Gate International Exposition in San Francisco and an expanded, internationalized Florida State Fair -- but also a breadth of technological marvels that had come to define consumer-oriented modernity in the early twentieth century. [385] Such musings on the dynamic relationship between humans and technology -- rooted in the Industrial Revolution and foregrounded by the devastating consequences of the First World War -- lay at the core of the Fair of the Future proposal, which assigned primacy to the interrelatedness of societal concerns over stylistic considerations.

This notion of interrelatedness flowed in great measure from Mumford's own writings, and an aesthetic position premised on site-specific socio-economic and environmental factors rather than formal or stylistic abstractions. Indeed, in commenting on the Fair in his regular Sky Line column for *The New Yorker*, Mumford wrote that "the best suggestion I can put forward toward making an architectural success of the coming exposition is not to imitate Paris or Stockholm, but to eliminate architecture itself as far as possible from the picture." [386] Although the Fair of the Future proposal anticipated exhibition buildings "contemporary and progressive in architectural form," aesthetic control would be in the hands of a social planning committee with veto rights over a design group, and the entire enterprise would function as a educational experience on the interrelatedness of society, science, and technology. [387]

While the Fair of the Future proposal garnered considerable public and political support, a competing plan arose from others seeking a far more historicist imprint on the Fair. Under the auspices of the AIA and the Architectural League of New York, a "Collaborative Council" of architects, artists, and landscape architects offered its services to the Fair Corporation with a commitment to "the closest kind of collaboration of all the arts in order to insure a harmonious, comprehensive, and artistic result." [388] Consistent with the La Farge-led historicist agenda of the prior decade, the Council insisted that "early and active participation of all artisans" in the design of the Fair was vital to ensure "proper collaboration between architect, painter, and sculptor." [389] A promise, however, of egalitarian "representation and responsibility" amongst architects and artists, and the proposition of engineers "collaborating with the architects" -- both significant departures from the La Fargian iteration of collaboration -- evidenced the Collaborative Council's eagerness, if not desperation, to gain support for its proposal. [390] With their stylistic influence waning as mainstream architects transitioned to more modernist vocabularies of expression, and fearful of a repeat of the "bizarre modernism" on display at the 1933 Chicago Century of Progress Exposition, historicists looked to the Fair for renewal of an aesthetic

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[385] Ibid., and Frederick A. Gutheim, "Federal Participation in Two World's Fairs," *The Public Opinion Quarterly*, vol. 3, no. 4 (October 1939), 609-610.

[386] Mumford, "Houses and Fairs," in Wojtowicz, *Sidewalk Critic*, 160.

[387] "Fair Planners Selected," *The New York Times* (12 December 1935), 33; and *The Fair of the Future 1939,* 17-18; in Santomasso, 108.

[388] "Collaborative Design for a World's Fair," *Landscape Architecture*, vol. 26 (July 1936), 195.

[389] Ibid., 194.

[390] Ibid., 193 and 195.

program that might once again "exert a considerable influence on architecture for a generation to come." [391]

The historicist-oriented Collaborative Council, however, remained trapped, as Eugene Santomasso observes, in a paradigm of "the completed building and the positive responses it is capable of provoking," whereas the Fair of the Future committee "looked to the generative forces at work in architectural design," that is, the socio-economic, environmental and cultural factors driving architectural production.[392] More to the point of this study, the polemics over the purpose and character of the Fair set into stark contrast the polar positions of the Fair of the Future committee -- cooperation toward an "interrelated" transformative vision -- and the competing proposal of the AIA and Architectural League grounded in collaboration and glorification of the past.

In a politically expedient maneuver to mollify, if not reconcile, these two positions -- each of which boasted influential supporters critical to the political and financial viability of the Fair -- organizers offered to re-structure the Fair Corporation to include an executive committee comprised of leading political figures and an assemblage of "highly regarded" architects to define the principal theme of the Fair, articulate its architectural character, and select design teams for Fair-sponsored pavilions.[393] Kohn and Shreve received initial appointments to this Board of Architects -- subsequently re-named the Board of Design to reflect the multidisciplinary make-up of its members -- along with architect Stephen Voorhees, an engineer by training and, like Kohn, a former AIA president. École-trained William Delano also joined the Board of Design, as did landscape architect Gilmore D. Clarke, industrial designer Teague of the Fair of the Future committee, and Jay Downer, a former engineer of the Bronx River Parkway acclaimed in some quarters for its "fusing of art and engineering." [394]

Kohn and Teague assumed further responsibility for bringing physical expression to the now bi-partite theme of the Fair -- Building for the World of Tomorrow -- intended at once to extoll business and technological innovation as originally envisioned by Fair organizers, while offering a didactic program on the societal impact of technology and industrialization as suggested by Fair of the Future committee. The Fair would display, as reported widely in newspapers, the "most promising developments of ideas, products, services and social factors of the present day in such a fashion that the visitor may, in the midst of a rich and colorful festival,

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[391] Santomasso, 108; and "Design for the Fair," *The New York Times* (23 May 1936), 14. Royal Cortissoz, ever the advocate for historicist causes -- La Farge died in 1938 before the Fair opened -- held aloft the Beaux-Arts inspired 1893 Chicago Expo as an apt model for the New York Fair. "One did not remember" the Chicago fair, Cortissoz remarked, "merely as style but as something exquisite that had touched your experience." ("Rival Art Groups Battle Over Fair," *The New York Times* (1 March 1936), N1.)

[392] Santomasso, 108-109.

[393] "Board of Design is Named for Fair," *The New York Times* (22 May 1936), 25; "Design for the Fair," *The New York Times* (23 May 1936), 14; and Santomasso, 110. The political members included Governor Lehman, Mayor La Guardia, and Robert Moses.

[394] "Design for the Fair," *The New York Times* (23 May 1936), 14; and "Board of Design is Named for Fair," *The New York Times* (22 May 1936), 25. Clarke was already providing consulting services to Robert Moses and the New York City Parks Department. Voorhees received his training as a civil engineer at Princeton. He was the first president of the New York Building Congress in 1921, a former AIA president, and business partner with Ralph Walker, who participated in the design of the 1933 Century of Progress Exposition in Chicago.

gain a vision of what he might attain for himself and for his community" -- and of relevance to this study -- "by intelligent, co-operative planning toward the better life of the future."[395]

Despite the tense negotiations giving rise to them, the dual themes nonetheless resonated with Kohn's own broad objective for the Fair: a demonstration in a "popular way" of the "economic and political peace" and societal benefits achievable through cooperation, though he anticipated public skepticism over "a serious social purpose" emanating from what was essentially a "colossal business venture."[396] Yet, by moving beyond the formulaic "vainglorious exhibition of the mechanical achievements of a century and a half," Kohn sought to put on display

> the better life which the great mass of citizens in our country might get for themselves if they knew and appreciated what was within reach and attainable to them in the way of better government, education, housing, recreation, health, labor conditions, social security and the means thereto through that cooperation which will result if all groups of our people sense their interdependence.[397]

Kohn's thematic objective may be distilled to two principal components. First, a renewed assertion of connectivity and shared ethical platform across all human relations as espoused by Adler and the Ethical Movement. Of particular import was the vital contribution individuals -- each keenly aware of their relations with others and their vocational purpose in society -- can make through cooperation to the general well-being of all. Secondly, the modernist paradigm that capitalism fueled by a production system rooted in technical rationality and a corresponding robust level of consumption would translate into a strengthening of democratic institutions. This aspect of the theme, as Joseph Cusker discusses, coupled an assertion of American economic potential -- unencumbered by the debacle of the Depression -- with an affirmation of American democratic superiority over communist and fascist alternatives taking hold elsewhere.[398] In other words, from Kohn's perspective, the Fair was to be a manifestation of Adler's ethical propositions for cooperation motivated by a greater societal good defined in explicitly democratic-capitalist terms.

Working with a small staff with shared sympathies -- Stein, Catherine Bauer, Philip McConnell, designer Louise Bonney, former director of WPA Federal Writers Project Holger Cahill, Gerald Wendt and Frederick Gutheim -- Kohn sought to break from the classificatory

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[395] "'World of Tomorrow' Is Selected as Theme," *The Washington Post*, (2 May 1937), B2.

[396] Robert D. Kohn, "Social Ideals in a World's Fair," *The North American Review*, vol. 247, no. 1 (Spring 1939), 116 and 120.

[397] Ibid., 116-117; and van Wesemael, note 175, 796.

[398] Joseph P. Cusker, "The World of Tomorrow: Science, Culture, and Community at the New York World's Fair," in Harrison, ed., *Dawn of a New Day*, 5.

organization of past fairs, the "temporally organized order of things and people" Tony Bennett ascribes to the "exhibitionary complex."[399] Such categorizations, Kohn explained

> would only perpetuate divisions convenient for technicians but not illuminating to laymen. We chose to make our major divisions more or less functional, the things with which the average man comes in contact in his everyday life -- food, shelter, clothing, communications, education, transportation, etc.[400]

Along these lines, Kohn anticipated there would be no individual pavilions dedicated to art or science as in past fairs,

> because we want science and art to permeate the fair. They are not isolated -- standing apart -- in the world, but they are found in everything, from shoes to iceboxes and furniture. So we hope to show how ordinary things are related to science and to art and to one another, co-ordinating and correlating the ideas of science and art with men's lives.[401]

This synthesis of science and art in daily life was, for Kohn, a metaphor for Adler's teachings on human relations and Mumford's propositions on the interrelatedness of life. He noted that the technological advancements flowing from this synthesis -- for instance, improvements in transportation and communication -- collapsed space and time in unprecedented ways to "bring men from the ends of the earth into a new and closer relationship with each other."[402] Yet, he presciently observed, the "concomitant problems and miseries" brought on by such new technologically-enabled relationships were not yet fully understood, necessitating careful attention to exploring "the interrelation and the interdependence upon each other of men within each function of modern life and the interdependence of function upon function."[403]

This alignment of Adler's ethical teachings on cooperation with Mumford's arguments on interdependence found its principal manifestation in Democracity, an exhibit crafted by Kohn's Ethical Society colleague Henry Dreyfuss housed within the "great half circle" of the Perisphere, which, along with the towering Trylon designed by Wallace K. Harrison and J. André Foulihoux served as ubiquitous symbols of the Fair (Images 11 and 12).[404] The exhibit depicted an eleven thousand square mile region of a million inhabitants, with an imaginary Centerton as its

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[399] Tony Bennett, "The Exhibitionary Complex," in David Boswell and Jessica Evans, eds., *Representing the Nation*, New York and London: Routledge (1999), 352. "Moreover," Bennett explains, "that order was a totalizing one, metonymically encompassing all things and all peoples in their interaction through time. And an order which organized the implied public - white citizenries of the imperialist powers - into a unity, representationally effacing divisions within the body politic in construction a 'we' conceived as the realization, and therefore just beneficiaries, of the processes of evolution and identified as a unity in opposition to the primitive otherness of conquered peoples." Philip McConnell was a librarian at the New School for Social Research, a gathering point for members of the Technical Alliance. Kohn and Theodore Veblen both taught at the New School.

[400] Kohn, "Social Ideals in a World's Fair," 117.

[401] "'World of Tomorrow' Is Selected as Theme," *The Washington Post*, (2 May 1937), B2.

[402] Robert D. Kohn, "Science and Human Relations," *The Standard*, vol. 18, no. 8 (April 1932), 262.

[403] Ibid.

[404] *New York City Guide: A Comprehensive Guide to the Five Boroughs of the Metropolis prepared by the Federal Writers Project of the Works Progress Administration in New York City*, New York: Random House (1939), 632-633; and Francis V. O'Connor, "The Usable Future: The Role of Fantasy in the Promotion of a Consumer Society for Art," in Harrison, ed., *Dawn of a New Day*, 62.

"business, educational, social, and cultural hub" linked by a network of roadways to outlying residential communities.[405] As the novelist Robert Luther Duffus reported prior to the Fair opening, Democracity

> will look like a spider web, with the spider in the center in a fairly close mesh and an assortment of flies, in much coarser mesh, along the periphery. This figure, of course, is purely a visual one, for the spider and the flies will be cooperators in a mutually beneficial enterprise.[406]

More importantly, beyond the visual metaphor, Duffus suggested that Democracity evidenced the feasibility of planning

> a metropolis in which there will be little or no traffic congestion; in which the pedestrian will never be exposed to danger from moving vehicles; in which adequate space will be allotted for parks, recreation centers, etc.; in which every one will look out from his windows on gardens, lawns, shrubbery and trees. Democracity is planned ahead, and in its entirety, for the comfort, convenience, safety and prosperity of the inhabitants.[407]

As Wesemael notes, Kohn and Dreyfuss intended Democracity as a "democratic-capitalist society that, based on a new realization of interdependence, had attuned its social and economic structure to scientific insights and rational planning."[408] It was, in this regard, a utopian view offering, as Wesemael continues, "a more efficient, comfortable and righteous society by means of comprehensive planning of urban and rural spatial development."[409] Much as with the Futurama exhibit by Norman Bel Geddes sponsored by General Motors, however, Democracity was less a proposal for a "perfect city plan" than an encapsulation of contemporary tendencies in city and regional planning.[410] While Kohn claimed that Democracity was "not a vague dream of a life that might be lived in the far future but one that could be lived tomorrow morning if we willed it so," he and Dreyfuss readily acknowledged that it was inconceivable in the present political climate and would most likely necessitate "firmer public control over land" and perhaps more radically, the elimination of private "land speculation."[411]

While Democracity realized to some extent Kohn's thematic objectives pertaining to ethics-based cooperation, interrelatedness, and greater societal good, and was by all accounts one of the more popular exhibits, Fair executives insisted on muting its social message, lest an overly didactic social theme interfere with the entertainment value of an automated six-minute ride into the future. Moreover, Kohn's aspirations for a more comprehensive impact on the

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[405] Joseph P. Cusker, "The World of Tomorrow: Science, Culture, and Community at the New York World's Fair," in Helen A. Harrison, ed., *Dawn of a New Day*, 14.

[406] R. L. Duffus, "A City of Tomorrow," *The New York Times* (18 December 1938), 21.

[407] Ibid.

[408] van Wesemael, 542.

[409] Ibid. Democracity, Wesemael notes, also bore an underlying message regarding "specialization, complexity and mutual dependence and that the eight-hour working day had allowed more possibilities for self-development and the development of the community."

[410] Duffus, 23.

[411] Robert D. Kohn, New York World's Fair Archives C 1.0, Theme Building, Democracity, as cited in Cusker, "The World of Tomorrow" in Harrison, ed., *Dawn of a New Day*, 14; and Duffus, 23.

implementation and manifestation of the Fair succumbed to the negotiated political expediencies intended to reconcile competing interests of the Fair of the Future Committee and the Collaborative Council. That the tensions between collaboration and cooperation remained unresolved in that negotiation may be seen most notably in the rejection by the Fair corporation of Kohn's quest to implement an element of the Fair of the Future proposal, that of a Committee on Social Planning to operate independently of the collaboration-oriented Board of Design.[412] The Social Planning committee, on which Kohn had hoped to seat Mumford and the sociologists Robert McIver and Robert Lynd, was a critical ingredient in realizing a didactic social program that would hold precedence over more abstract stylistic considerations. Having already shown their resistance to an overly didactic agenda for fear of losing visitor interest and revenue, the Fair Corporation instead opted to grant the Board of Design control of the overall architectural program for the Fair.[413]

The historicist orientation of the majority of Kohn's colleagues on the Board was most evident in a Beaux-Arts-inspired master plan that, coupled with a comprehensive strategy for landscaping, illumination, and building color, would ensure "coherence of the whole phenomenon."[414] As the contemporary writer John Peale Bishop observed first-hand, this strategy relied upon

> a carefully considered scheme of color, imposed upon all contributors to the Fair, beginning with the trylon and perisphere at the center, which alone are pure white, and spreading outward, deepening as it goes. On Constitution Mall, for instance. the colors used turns from rose to dark burgundy. The background, however, remains throughout one or another off-white, which is further varied by murals and by sculptural groups of white plaster, which stand out at night from an illumination like a haze of gold.[415]

It was an architectural strategy of control, as Frank Monaghan summed up in official Fair documents in 1939, expressive of the Board's desire for an architectural program that would be "the result -- as far as possible -- of collaborative effort."[416]

Notwithstanding the authority granted to the Board of Design by the Fair corporation, significant obstacles arose to realizing this "collaborative effort." First, the Board anticipated that Fair-sponsored pavilions by a handful of pre-selected architects would codify design guidelines for other structures to be erected by private and international exhibitors.[417] These exhibitors, however, resisted any restriction that might subsume the design of individual pavilions, and more importantly corporate or nationalistic messages, into a singular architectural character. While Voorhees made every effort to assure exhibitors they would be "permitted real

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[412] van Wesemael, 461; and Carol Hagan, *Visions of the City,* unpublished PhD. dissertation, 70.

[413] van Wesemael, note 173, 796.

[414] Ibid., 489-490.

[415] John Peale Bishop, "World's Fair Notes," *The Kenyon Review*, vol. 1, no. 3 (Summer 1939), 240.

[416] Frank Monaghan, M.A., Ph.D., "The Fairs of the Past and the Fair of Tomorrow, Part II, The New York World's Fair of 1939" (New York: Encyclopaedia Britannica, Inc., 1939), 31, Haskell Collection, Box 42:8, Avery Architectural and Fine Arts Library, Columbia University.

[417] Pressure on the Board of Design to expand the pool of pavilion architects led to the orchestration of an open competition intended to discover "new talent among younger architects," but there were no commitments to retain any of the architects for the Fair or to construct any of their submissions, which nodded stylistically toward the historicist-oriented Board of Design sitting as jury ("World Fair Awards Made for Designs," *The New York Times* (11 November 1936), 24. For more on the competition, see Santomasso, 108-112.

expression of their individuality" within the framework of Board-mandated guidelines, designers nonetheless remained fearful of any infringements on their creativity by a seemingly autocratic Board of Design.[418] One observer cautioned:

> An ominous sign is the lack of enthusiasm on the part of those who have already collaborated and passed through the firm hands of the design board . . . which has apparently acquired an esthetic supreme court complex. . . Our real sympathy goes out to the architect who has created a distinctive building, and finds that when it has the same color as all its neighbors, it will look like a pea in a pod.[419]

Ultimately, as Wesemael notes, economic exigencies far outweighed aesthetic considerations as exhibitors, a critical source of Fair revenue, pursued their own stylistic and thematic inclinations.[420] When the Fair opened in April 1939 on the former Flushing Meadows marshland, other than Board-mandated zones of color and a consistent palette of landscaping and illumination, there was little evidence of the Board's desired "collaborative effect."[421] The axially-oriented plan master plan, intended to channel the glories of the Renaissance, in general, and past fairs, in particular, suffered from sufficient "irregular configurations" attributable to political and commercial exigencies -- for instance, multiple visitor entrances rather than a single grand portal -- that dampened its overall visual and organizational intent.[422] Coupled with the diverse character of pavilions, the resulting architectural effect, as Santomasson observes, "confounded" most observers with a disparate collection of modernist and pseudo-historicist allusions that fell far short of the hoped-for renewal of an historicist aesthetic program.[423] The Fair may, in fact, have produced the opposite outcome. Much as scientists, as Kuznick explains, sought to make their mark on the Fair instead "received a sobering object lesson in their declining power to shape either the direction of or public perception of science," so too did

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[418] "2 New Fair Units to Cost $575,000," *The New York Times* (9 July 1937), 40.

[419] "The Fine Arts at the Fair," signed by New Yorker, in "Letters to the Times," *The New York Times* (9 February 1938), 18.

[420] van Wesemael, 489-490. Exhibitors, moreover, ignored Board of Design instructions intended to limit the roster of architects and control the contribution of individual architects. Skidmore & Owings, for instance, designed a total of nine structures: Venezuela, RCA, Westinghouse, Swift and Company, Standard Brands, Gas Industry, Continental Bakery, Toffenetti Restaurant, and Baby Incubator (van Wesemael, note 237, 799).

[421] John Peale Bishop observed that "[m]any of the walls are blank. Monotony has been avoided by a carefully considered scheme of color, imposed upon all contributors to the Fair, beginning with the trylon and perisphere at the center, which alone are pure white, and spreading outward, deepening as it goes. On Constitution Mall, for instance. the colors used turns from rose to dark burgundy. The background, however, remains throughout one or another off-white, which is further varied by murals and by sculptural groups of white plaster, which stand out at night from an illumination like a haze of gold." (Bishop, 240).

[422] Eugene A. Santomasso, "The Design of Reason: Architecture and Planning at the 1939/40 New York World's Fair," in Harrison, ed., *Dawn of a New Day*, 32. On this topic, Mumford wrote: "For what they did in elaborating this bare skeleton was to superimpose upon the abstract Renaissance formalism the informal, disconnected rambling plan (with irregular spottings of buildings) that as popular in suburban developments a generation ago. The resulting plan is so weak in conception that it is valueless as a precedent, and if I am not mistaken, it will not even work effectively as a traffic plan in facilitating the passage of visitors through the grounds (Lewis Mumford, "The Sky Line: The World's Fair," *The New Yorker* (8 May 1937), in Wojtowicz, 182).

[423] Santomasso, "The Design of Reason," in Harrison, ed., *Dawn of a New Day*, 30. Perhaps Mumford's most damning criticism of the Fair was that from an architectural perspective, "the chief claim of the World's Fair on the attention of posterity will be the preposterous fact that [Frank Lloyd] Wright was not called in to design it." (Lewis Mumford, "The Sky Line: At Home, Indoors and Out," *The New Yorker* (12 February 1938), in Wojtowicz, 208.

historicists find themselves increasingly marginalized, their realizations at the Fair a mere shadow of the idealized collaboration of the Chicago Exposition a half-century earlier.[424]

Interestingly, Lescaze himself had recently proclaimed the end of historicism in public architecture -- "the stranglehold formerly held by imitation Greek and Italian architecture on all of our public buildings has at last been broken," while asserting that the better pavilions at the Fair were true expressions of "good modern architecture."[425] Lescaze's own contributions included the Swiss Pavilion designed with John R. Weber -- evidence of that country's "initiative, creative spirit and hard work" in the face of the rising German threat -- and the sixty-thousand square foot Aviation Building with his "associate" J. Gordon Carr.[426] Here Lescaze and Carr resorted to an abstraction of flight "by means of a conically-shaped hall that suggested a wind tunnel or a hanger," containing in its midst a "modern transport plane suspended…arranged so that a person may sit in the pilot's seat and manoeuvre the mechanical devices that operate such a plane in flight."[427] Interestingly, however, neither of these installations evidenced Lescaze's professed modernist iteration of collaboration, in which architecture and visual arts are inseparably fused. Artist Arshile Gorky did indeed furnish a mural in the Aviation pavilion but, contrary to Lescaze's "organized and directed" collaboration inspired by his idealization of the Renaissance, the artist was not present at the architect's side from "from the beginning of the dream to the tangible realization."[428] Compounding this was that Gorky was unable, as with other artists employed at the Fair under the WPA Federal Art Project, to execute his own work due to burdensome union regulations restricting implementation of certain artistic works to members of the Mural Artists Guild.[429]

Despite these restrictions, overall artistic output at the Fair was voluminous, with well over two hundred murals and sculptures specifically commissioned by the Fair corporation. These were in addition to private commissions sponsored by individual and foreign exhibitors, and murals produced under the Federal Art and Project and Treasury Relief Art Project within "conservative academic standards" guidelines put forth by the Collaborative Council.[430] Add to this some eight hundred art pieces of contemporary American art and "the last minute announcement of a thirty million dollar Exhibition of Paintings by Old Masters," it is clear that rather than the "collaborative effect" sought by the Board of Design, the visual arts reached a

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[424] Kuznick, 342.

[425] "Modernism Spreading in Architecture," *The Washington Post* (16 July 1939), R8.

[426] "Finland to Stress its Woods at Fair," *The New York Times* (March 9, 1939), 16; "Democracy is the Theme at the Swiss Ceremonies," *The New York Times* (8 May 1939), 8; Dr. Victor Nef, Commissioner General for Switzerland, "Switzerland's Cultural Gains Depicted in the Exhibit at the Fair," *The New York Times* (1 September 1939), 12; and "Secretary to William Lescaze" correspondence to Mrs. Mabel Dodge Luhan dated 28 April 1938, Box 58, William Lescaze Papers, Syracuse Archives. Lescaze and Weber did not undertake the Swiss Pavilion as equal partners. They had identical billing rates of $2/hour plus reimbursement for draftsmen salaries and miscellaneous office expenses. Lescaze, however, retained 60% of the pre-established fixed fee and profit even though Weber worked more total hours than Lescaze ("Swiss Pavilion, New York World's Fair, Job #597 A and B, Budget vs. actual analysis dated November 16, 1939," Box 61, William Lescaze Papers, Syracuse Archives.

[427] Santomasso, "The Design of Reason," in Harrison, ed., *Dawn of a New Day,* 35; and "Visitors to 'Pilot' World Fair Plane," *The New York Times* (9 February 1938), 15.

[428] William Lescaze, "Marginal Notes," 275-276; and Lanmon, 132.

[429] O'Connor, "The Usable Future:" in Harrison, ed., *Dawn of a New Day*, 65.

[430] Elizabeth McCausland, "Preview: World's Fair Murals and Sculptures," *Parnassus,* vol. 10, no. 7 (December 1938), 9.

level of ambiguity consistent with the stylistic discord of the Fair architecture.[431] As artist Ralph M. Pearson wrote:

> Was it necessary for the Board of Design to be so catholic in its tastes?. . . Was the policy of placating the World of Yesterday in creating a promise of the World of Tomorrow compulsory? Or was it the result of confusion or even ignorance of what constitutes the great art of all time -- past, present, and future?[432]

Chapter Conclusion

This formal, thematic, and temporal confusion at the Fair -- further compounded by "anecdotal" murals bearing "little vital relationship" with the architecture to which it was applied and a Town of Tomorrow display of an eclectic mix of modern and neo-classical prototype residences -- may be seen as direct evidence of the unreconciled tensions amongst the dueling proponents of collaboration and cooperation.[433] Further indication of this is that the Fair, with its negotiated, visitor-confounding bipartite theme, came to the brink of financial collapse and rescued only by an unplanned second year of exhibition.[434] Yet, perhaps the most damning assessment was by Mumford, whose own initiatives for the Fair lay subsumed within a meaningless, physically incoherent, "veracious formlessness."[435]

> The buildings sprawl, billow, leap, perambulate, following no order except the sweet will of the exhibitor and his architect. Though the Fair spreads to gigantic distances, just like the modern metropolis itself, it has the air of being cluttered, even congested. Here, too, there is a contradiction between the formlessness of the architecture and the mechanical equipment and the devices of large-scale organization shown by the exhibits, with their sober ingenious demonstrations of the way tires are fabricated, motorcars built, cows milked, or statistics tabulated.[436]

Compounding these frustrations was that the "major contribution to urban design" many of Mumford's colleagues hoped might emanate from their work at the Fair stumbled over insurmountable political and financial obstacles. The dreaded outcome, he concluded, was that "their wreckage is strewn about the Fair, so thoroughly smashed and disfigured that their own fathers could scarcely identify the corpses."[437]

Not long after closure of the Fair and deconstruction of its pavilions for scrap, Kohn solemnly reflected on the state of ethics-based cooperation in America. "We have taken steps in the past century to organize on the basis of function," Kohn noted, an acknowledgement of the pervasiveness of labor unions and ongoing specialization in the professional class. While these

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[431] Ibid., 6; and James Johnson Sweeney, "Thoughts before the World's Fair," *Parnassus*, vol. 11, no. 3 (March 1939), 3.

[432] Ralph M. Pearson, "The Artist's Point of View," *Form and Century*, vol. 101, no. 5 (May 1939), 287.

[433] Sweeney, 3; and Douglas Haskell, "Town of Tomorrow: New York World's Fair," *Architectural Forum*, vol. 71, no. 1 (July 1939), 63-72.

[434] Characterized by a thematic shift from "Building the World of Tomorrow" to an inspirational "For Peace and Freedom" as a nod to the surge of war in Europe.

[435] (Mumford, "The Skyline in Flushing: West is East," in Wojtowicz, 236.

[436] Ibid.

[437] Lewis Mumford, "The Sky Line in Flushing: Genuine Bootleg," *The New Yorker* (29 July 1939), in Wojtowicz, 242.

tendencies ostensibly offered some degree of economic protection or enhancement for these groups, he observed with dismay that progress "towards recognizing and establishing their relations with each other and their effect on the general welfare" had been inconsequential, and that here had been no progress whatsoever "towards discovering their potential effects on the individuals concerned in them." [438]

This gloomy prognosis, coming in 1941 after irreconcilable geo-political differences had erupted once again in global warfare, is a nod not only to Kohn's continuing concerns about self-serving divisions of labor as obstacles to "right relations," it reflects as well the limitations of his own extensive undertakings to promote ethics-based cooperation at all levels of society as promulgated by Adler. With the PWA, his confidence in government as an agent for change in times of great societal challenge -- stirred by his earlier experiences with the Emergency Fleet Corporation during the First World War -- withered in the vastness of bureaucratic, political, and economic reality. Similarly, his commitment to cooperation as the basis of human relations in a progressive democratic society -- engrained through a lifetime of exposure to and proselytizing on behalf of the Ethical Movement -- crumbled in the face of intense public polemics over the meaning and purpose of a World's Fair -- a celebration of the past or gaze into the future? -- at a crucial moment when America teetered at the cusp of social and economic recovery from a decade-long depression. The totality with which Kohn immersed himself into cooperation as the basis of collective action left him deeply dismayed by the lack of progress in this direction by the early 1940s, a condition punctuated by the enormity of a second world war.

For Lescaze, his re-casting of collaboration from a decidedly historicist endeavor to a modernist integrative device by contextualizing it on a continuum of artistic activity dating to the Renaissance fell victim to his own inaction. The organizational structure for Williamsburg Houses and for his two commissions at the New York World's Fair followed hierarchical lines consistent with his iteration of collaboration -- architect as "symphony conductor" over the activities of his attentive specialists -- yet on both accounts he came short of the synthesis of architectural and artistic activity about which he spoke so passionately. Indeed, in Lanmon's assessment of Lescaze's roster of architectural commissions adorned with artistic pieces -- Max Spivak's mosaics at the Calderone Theater (1949), Jose de Rivera's sculpture and Hans Hofmann's mural at 711 Third Avenue (1956), a sculpture for 777 Third Avenue by Beverly Pepper (1964), and a Pierre Soulage ceramic tile mural at 1 Oliver Plaza building in Pittsburgh (1968) -- she observes that only for the Pittsburgh project "was the artist retained right from the start." [439]

Lescaze nonetheless remained an outspoken proponent of collaboration throughout his career, and his reputation as a modernist remained untainted despite the contradictions in practice. His resilience may been seen in an invitation from the Architectural League -- a 1940 exhibition included the CBS headquarters in Hollywood (1938) and the Aviation Building and Swiss Pavilion from the 1939 World's Fair -- and an appeal to re-join the League as a member.[440]

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[438] Kohn, WQXR (New York) radio address, 12.

[439] Lanmon, 132.

[440] "Photographs Exhibited at Architectural League, February 1940," Box 56, William Lescaze Papers, Syracuse Archives.; and Morris Ketchum correspondence to William Lescaze dated 14 October 1958, William Lescaze Papers, Box 56, Syracuse Archives. Lescaze's completed work exhibited by the Architectural League in February 1940 included the CBS headquarters in Hollywood (1938), the Aviation Building and Swiss Pavilion at the 1939 World's Fair, and the PSFS Building in Philadelphia (1932).

His arguments for collaboration remained unwavering well into his later years, maintaining the Renaissance as an exemplar of collaborative behavior.[441] Speaking before the United States Senate, he recounted his role "in that struggle for acceptance of good modern architecture," and with modernism having claimed victory over its historicist opposition, "the time has come for us to bring painting and sculpture into harmony with architecture."[442] This suggests that Lescaze's personal agenda gave primacy to the legitimization of modernism over the dissemination of collaboration, and, more importantly, that the legitimization of modernism and the modernist architect -- not to mention Lescaze's reputation -- were dependent neither on the theorization nor practice of collaboration.

In this regard, for both Kohn and Lescaze, there were distinct gaps between the idealization and realization of collective action, between its theory and practice. Both men invested in these terms -- collaboration and cooperation -- aspirations for a unified physical or ethical outcome only to be besieged by the vagaries of practice. This does not imply that these were flawed theories, or that Kohn and Lescaze were ill-prepared to realize them in practice. Rather, it suggests that, as with La Farge before them, theories of collective action either operate at an overly ambitious scale -- for Kohn, nothing less than all of democratic society -- or are in fact premised on motivations, as with Lescaze, engaged with issues of professional identity, authorship, and authority that are more likely to provoke divisiveness and boundary-making than unified action. It further suggests that theories of collective action -- collaboration, cooperation, teamwork, total building, etc. -- regardless of semantic, stylistic, or political persuasion, fail to adequately account for, as with similar transformative aspirations, the diverse motivations and competitive tensions intrinsic to their undertaking and ultimate demise.

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[441] William Lescaze, unpaginated typescript of lecture to "Lantern Club" at Exeter, 10 November 1955, third page, Box 65, William Lescaze Papers, Syracuse Archives; and William Lescaze, "Thoughts on Arts and Architecture," unpublished memorandum dated 7 October 1965, Box 55, William Lescaze Papers, Syracuse Archives.

[442] Lescaze, "Read before US Senate," 2.

Chapter Four

Serge Chermayeff:
Architecture as Science and Collaboration as Process

In the heady final days of the Second World War, Vannevar Bush, director of the federal Office of Scientific Research and Development, authored *The Endless Frontier* report to Franklin D. Roosevelt in which he outlined the seemingly infinite possibilities for scientific knowledge in a post-war world in which democracy, not incidentally, would reign supreme.[443] This was not, however, the ethics-based democracy of cooperation discussed in the preceding chapter that Robert Kohn had endeavored to put on display at the New York World's Fair of 1939-40. It was instead a democracy fortified by techno-military accomplishments and a burgeoning American global presence. In this milieu, Bush's forecast for scientific gains resonated with the American corporate sector, as evidenced by a flurry of attention in the 1950s and 60s to organizational and operational methodologies intended to enhance productivity and profitability. Taking a cue from their patrons, architects similarly pursued systemization of the design process to enhance the efficiency and outcome of architectural production, while idealizing collaboration as a unifying methodology amongst diverse professions involved with the built environment. Realization of these objectives, however, stumbled over nagging concerns about architectural identity, authority, and the delineation of disciplines to be granted access to such a field of action. The ensuing discourse, characterized by competing theorizations on the interrelationship of art, science, nature, and technology, proved to be less about collaboration as technique -- that is, how to collaborate -- than an effort to re-cast the identity of the architectural profession in the image of the sciences and science-like professions now privileged by society.

Architect and educator Serge Chermayeff (1900-1996) (Image 13) figured prominently in this post-Second World War architectural discourse. As with La Farge, Lescaze, and Kohn of the prior chapters, Chermayeff left a substantial record of writings and lectures on collective action that offer insight into both his own contributions to and the complexities of the discourse. However, whereas La Farge and Lescaze each sought to elevate architecture above competing professions by romanticizing an intimate collaborative past with the arts, and Kohn subsumed architecture into a broader ethical program amongst the modern professions, Chermayeff set out to utterly transform the profession through its absorption into a broadened field of environmental design that, in collaboration with the sciences, would play a pivotal role mediating between societal and environmental exigencies. This transformative position flowed from two overarching propositions. First, that considerations of the human condition were inseparable from the state of the environment, a vital influence "on man's thought and action, capable of destroying or creating health and happiness."[444] Secondly, that to play a mediating role in that equation, architects need to shed the outmoded training and practice of a pre-industrialized past in favor of a scientific organizational and methodological paradigm.[445] Toward this end,

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[443] Vannevar Bush, *Science: The Endless Frontier* (Washington, D.C.: United States Government Printing Office, 1945).

[444] Serge Chermayeff, "World Peace" (1949), in Richard Plunz, ed., *Design and the Public Good, Selected Writings, 1930-1980 by Serge Chermayeff* (Cambridge, MA and London: The MIT Press, 1982), 33.

[445] Serge Chermayeff, "Design as Catalyst," *Socio-Economic Planning Sciences*, vol. 1 (1967), 64.

Chermayeff championed a language of scientific research and process over typology of form, a re-integration of design professions long separated in practice and academia, and the collective over the individual.

Despite this commitment to collective action, Chermayeff's position on collaboration was for much of his career more nuanced than that of La Farge and Lescaze, gaining clarity slowly over time as an integral component of an evolving pedagogical strategy. To understand this position, I first consider the formative professional and cultural experiences of the 1920s and 30s that shaped his interest in collective action and in the sciences as a model for architectural practice. I then examine his transition in the 1940s from active architectural practice to academia, and an emerging pedagogy premised on a unified field of environmental design encompassing architecture and related design professions. It is here, in the working relations between this unified field and the sciences, that Chermayeff's most articulate propositions for collaboration may be located. I conclude the chapter with his continuing efforts in the 1950s and 60s to incorporate research methodologies and collaboration into architectural training at Harvard and Yale amidst broad academic interest in an inclusive iteration of collaboration -- manifested in the design methods movement -- and an exclusionary iteration carried out in practice and professional journals that perpetuated the collaborative divide between architects and engineers.

Background: Serge Chermayeff

Although his prognostications on collaboration would ultimately bear the most influence in academia, Chermayeff lacked formal architectural training of his own, instead moving through a succession of diverse jobs as a young adult in 1920s England -- he had relocated with his family to England from the Chechnya region at the age of ten -- in magazine illustration, dance, and decorating.[446] As Alan Powers cautions, the picture of these early years is somewhat murky, for it relies almost exclusively on Chermayeff's own often unsubstantiated resumes and retrospective interviews later in life. Nonetheless, if there is a pattern to be discerned, it is one of increasing engagement with interior design, principally in the residential sector, with the notable exception of the Cambridge Theatre in London while employed with Waring and Gillow before establishing his own practice in 1930.[447] Chermayeff remained for several years thereafter principally engaged with interiors, furniture and industrial design, followed by a brief and contentious partnership with Erich Mendelsohn from 1933 to 1935 -- they produced two private residences and the De La Warr Pavilion at Bexhill-on-Sea (Image 14) -- and then a handful of independent commissions before closing his practice in the economic turmoil leading up to the Second World War. [448]

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[446] The principal scholarship on the life and work of Serge Chermayeff includes Richard Plunz, ed., *Design and the Public Good, Selected Writings, 1930-1980 by Serge Chermayeff* (Cambridge, MA and London: The MIT Press, 1982); Alan Powers, *Serge Chermayeff: Designer, Architect, Teacher* (London: RIBA Companies Ltd., 2001); and Betty J. Blum, "Oral History of Serge Chermayeff," compiled under the auspices of the Chicago Architects Oral History Project, Ernest R. Graham Study Center for Architectural Drawings, Department of Architecture, The Art Institute of Chicago (2001). This background section draws principally from the text by Powers.

[447] Powers, 7-32. Powers notes that Chermayeff included the title "Interior Architect" on his letterhead while awaiting acceptance by RIBA to Fellowship status (47).

[448] Powers, 52 and 58, and 64-115. John R. Gold notes that "from 1933 onwards, a wave of refugees arrived from Continental Europe. To come to Britain, they needed to enter partnerships with British or British-naturalized architects: hence Gropius and Fry, Yorke and Breuer, Chermayeff and Mendelsohn." (John R. Gold, *The Experience of Modernism: Modern Architects and the Future City: 1928-1953* (London: E & FN Spon, 1997), 91).

Despite his relatively limited architectural production, this period is of interest for it was when, as Chermayeff fondly recalls, he came of age amidst

> an emerging new elite of artists, writers, philosophers, scientists -- contemporaries, colleagues, and friends -- sharing in and stirring up a powerful new brew, as events proved later, broadening and deepening the scope of design and bridging old separations.[449]

Collective Action

It is in this "emerging new elite" -- he claimed amongst his friends and associates the artists Henry Moore, Ben Nicholson, John Skeaping, and Eric Gill, and the scientists Hyman Levy, Alfred Bacharach, Julian Huxley -- that we begin to see evidence of Chermayeff's interest in collective action. More specifically, in his engagement with a number of seminal groups fostering, in his own words, "free interchange of ideas on all subjects affecting architecture."[450]

Such "interchange" was relatively common for the era, exemplified by John Gold's observation that British modernists "felt a powerful urge to associate into groups for mutual support" for their diverse professional, stylistic, and civic causes.[451] This "urge," of course, was by no means limited to the British profession. Similar tendencies were evident during the intra-war years in Italy when the Fascist regime pursued an enormous public works program intended to offset private sector unemployment, create infrastructure to sustain the state, and establish physical evidence of the regime's existence. The initiative produced tremendous opportunities for architects and engineers who competed vigorously for commissions amidst volatile polemics over the direction and definition of "modern" and "Italian" architecture. In this dense landscape of competitions, groups of similarly minded architects joined forces to enhance their prospects of winning commissions. Beyond apparent economic benefits, the proliferation of such Italian groups in the late 1920s -- including Gruppo Sette, Gruppo Labirinto, the Club Urbanisti, and Gruppo Aschieri -- signaled a de-emphasis of the architect-hero paradigm in favor of a more collective character to Italian architectural practice.[452]

This de-emphasis gained traction elsewhere on the Continent, most notably with the formation of CIAM in 1928 by modernist architects partially in response to perceived inequities in the League of Nations headquarters competition. In subsequent declarations, CIAM members idealized the Functional City as a rationalized, mechanized organism constructed anew that -- unlike its pre-industrial predecessor ill-prepared to accommodate the intensification of industrialization -- would be logically organized around functions with distinct social

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[449] Serge Chermayeff, "Obviously Something New is Abroad" (1973), *Design and the Public Good*, 298.

[450] Serge Chermayeff, "Thinking about the Thirties" (1979), *Design and the Public Good,* 215; and Serge Chermayeff, "Crisis in Architecture," (1940), *Design and the Public Good*, 133. Chermayeff and Gill were to be on the faculty of the planned but never realized Académie Européenne Méditerranée, intended as a program of "collaboration" in "architecture, painting, sculpture, ceramics., textiles, typography, theatre, music and dance, photography and film." The directors included Wijdeveld, Mendelsohn, and Ozenfant (Promotional pamphlet, undated, Box 33: Académie Européenne Méditerranée Administration c.1933, Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library).

[451] Gold, 107.

[452] See, for instance, Giorgio Ciucci, *Gli architetti e il fascismo: Architettura e citta 1922-1944* (Torino: Giulio Einaudi editore s.p.a., 2002). This collective approach received endorsement from the Fascist Union of Architects until Alberto Calza Bini initiated a program of discouraging it in 1930 (Ciucci, 70n.).

motivations. While the crafting of seemingly universal manifestos by Le Corbusier and Giedion erased polemical differences amongst diverse CIAM participants including "Catalan trade unionists, Muscovite collectivists, Italian fascists, and . . . sharp-eyed technical experts," the commonality was clear: the need for a radical re-thinking of the planning and re-configuration of cities to avoid the perpetuation of "urban chaos." Of relevance to this discussion is that the ideas behind the Functional City were consistent with two emerging tendencies: a deep conviction in the capacity of architecture as a transformative tool, and that this transformative capacity would be the outcome of collective action.[453]

These were the very convictions prompting Chermayeff, Wells Coates, Raymond McGrath, and Mansfield Forbes to gather with like-minded colleagues in 1930 as the Twentieth-Century Group for the purpose of promoting modernist industrial and architectural design as an "expression of contemporary life."[454] Despite initial enthusiasm amongst its members, other than a single manifesto to this effect published in the *Architects' Journal* in July 1930, the group gained little traction.[455] With Chermayeff on the group's executive committee, seemingly interminable polemics amongst members on the meaning and breadth of modernism -- no longer "apparent in the midst of all this medley" -- precluded cohesive action, and within several years the group dismantled.[456]

Further modernist collective effort took shape in the Modern Architectural Research Group (MARS), organized in 1933 by Coates, Edwin Maxwell Fry and Philip Morton just prior to the fourth CIAM Congress in an effort to engage otherwise isolated English architects in the modernist project. Chermayeff was an early member of the group along with McGrath, F.R.S. Yorke, Berthold Lubetkin, Ernö Goldfinger, and Colin Lucas, many of whom were exiles from the Continent involved in short-term partnerships with British architects. There is, however, little evidence of any substantive contribution by Chermayeff to MARS. He represented the group on the RIBA Foreign Relations Committee and was to have helped organize a 1938 exhibition.[457] Of interest is that amidst recurring debates within MARS over the group's direction and commitment to CIAM principles, Chermayeff and the architectural critic and editor J. M. Richards published a satirical piece in a 1935 issue of *Architects' Journal*. As Hélène Lipstadt observes, the article is not unusual for its contemplations on the promises of urban planning and construction technology, rather for its imaginary retrospective from the year 2035

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[453] Eric Mumford, *The CIAM Discourse on Urbanism,* 73-91; Le Corbusier, *The Radiant City: Elements of a Doctrine of Urbanism to be Used as the Basis of Our Machine-Age Civilization* (New York: Orion Press, 1967) [1933], 188 as cited in James Holston, *The Modernist City. An Anthropological Critique of Brasilia (*Chicago: University of Chicago Press, 1993), 39; and Jose Luis Sert, *Can Our Cities Survive*? (Cambridge: The Harvard University Press, 1942), 4.

[454] Powers, 39; and "Brief Statement of the Twentieth Century Group," undated typescript attributed by Plunz to Chermayeff, Coates, McGrath, and Forbes, *Design and the Public Good*, 109. Interestingly enough, the organizers carefully prescribed membership in the group to include ninety architects, structural engineers, and designers, along with a maximum of sixty additional members drawn from other callings (Gold, 108).

[455] Powers, 40; and Gold, 109.

[456] "Brief Statement of the Twentieth Century Group," 109. Powers notes that although the group accomplished little, it "represented hopes for modernism only partially realized in Britain in the 1930s, notably the paradigmatic position of industrial design between architecture and art, and the intimate relationship between design and the whole moral and economic culture -- issues perhaps too vast to be encompassed by a voluntary organization" (41). Powers also notes that at meetings of the group, "Coates read books by Wyndham Lewis, and shared Lewis's belief in the artist's role as the originator of dynamic change in society."

[457] MARS papers, RIBA Library, Ove Arup MSS, ArO 1/5/1. as cited in Powers, 41, footnote 14.

of twentieth-century events of import to the architectural community.[458] In this critique, Chermayeff and Richards acknowledge the seemingly endless polemics amongst modernist architects over the role and direction of the profession and, more to the point, question the efficacy of their collective efforts. "Unable to make buildings and other things," Chermayeff and Richards write of their squabbling modernist colleagues, "they made and unmade groups and circles, and had fights among themselves, and made their feeble forces even feebler."[459]

Despite this critique, Chermayeff remained a MARS member for some years thereafter and his engagement with collective action groups continued unhindered. He had some involvement with the Architects' and Technicians' Organisation (ATO), a group initiated by Berthold Lubetkin and his Tecton colleagues to focus on pragmatic matters pertinent to the building industry and public sector architectural employees. Chermayeff lectured at a number of ATO gatherings and participated, along with Lubetkin and Ove Arup, in its air raid precautions (ARP) campaign, an effort he subsequently continued in the United States as a series of precautionary articles.[460]

These ARP articles, published in 1940 and 1941 as the Second World War prompted Chermayeff's relocation to the United States, were the first significant public expression of his sentiments on collaboration.[461] Well aware of the criticism lodged at the Chamberlain government for complacency in preparing Britain's defenses for a German invasion, Chermayeff urged advance ARP planning by the American government for the seemingly inevitable crossing of the war to its shores.[462] While principally oriented toward short-term objectives of "maintenance of production" and "preservation of life and morale" in the event of war, Chermayeff acknowledged that federal commitment to an ARP program would set into motion a longer term strategy that might not otherwise be politically or economically palatable in peacetime: decentralization of the pre-industrial city in favor of new communities positioned in outlying and invulnerable regions.[463] By taking a long-term view of new construction under ARP and, most importantly, with the inclusion of architects in the program, Chermayeff posited

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[458] Hélène Lipstadt, "Polemic and Parody in the Battle for British Modernism," *Oxford Art Journal*, vol. 5, no. 2 (1983), 22-23. Richards was the editor of *Architects' Journal*, followed by the same position at *Architectural Review* from 1937 to 1971. He was the author of A*n Introduction to Modern Architecture* published in 1940.

[459] Powers, 42.

[460] Mumford, 91, 119; and Powers, 143-144.

[461] Serge Chermayeff, "Architects and the A.R.P.," *Pencil Points*, vol. 21, Special Supplement (November 1940), unpaginated; "Implications of A.R.P.," *Pencil Points*, vol. 22 (July 1941), 489-490; "A.R.P. and Our Office of Civilian Defense," *Pencil Points*, vol. 22 (September 1941), 591-593; and "A Reply," *Pencil Points*, vol. 22 (October 1941), 656.

[462] Chermayeff argued that ARP planning did not require just the protection of areas deemed "vulnerable" to enemy attack, it entailed an enormous program of relocating high-value industrial and power generation targets to "invulnerable" regions of the country, along with housing, social services, and transportation facilities necessary to sustain them (Chermayeff, "Architects and the A.R.P.")

[463] Chermayeff, "Architects and the ARP," first page. Plunz observes that "skepticism about the virtues of urbanity had been present in all stages of the US cultural development, [but] this time the symptoms were manifest in ways that had even unthinkable previously. Even the 1950s hysteria about civil defense, which led to programs ostensibly for the protection of city dwellers from the threat of nuclear attack, was futile and absurd. In 1951 the Bulletin of the Atomic Scientists devoted an entire issue to "Defense through Decentralization." It advocated dispersing existing large cities into smaller settlements to avoid concentrated targets for nuclear attack. The ideal model suggested was a drastically reduced city core surrounded by small satellite towns" *(*Plunz, *History of Housing in New York City*, 47).

that the country would avoid the prospect of poorly planned and constructed "defense housing" degrading into the "slums of tomorrow."[464]

Three components of the Chermayeff ARP proposal are relevant to this discussion. First, a critical role for architects framed in overt expressions of patriotism and societal benefit. As Chermayeff saw it, with their "clear view of the social needs, the required planning, and construction," architects would bear a "responsible" role in ARP planning by conducting surveys of existing building and housing stocks, planning special purpose structures such as casualty stations and firefighting facilities, identifying artifacts of historical and cultural value requiring special protection, and, in the event of military attacks, directing inspections of building damage, debris clearing, and emergency repairs.[465] This argument -- coupling short-term exigencies of survival in the "unhappy contingency of war" with a long-term program of decentralization enhanced by the "synthesizing minds of Planners and Architects" -- reflected Chermayeff's confident prognosis for a post-war future characterized by architects operating in the public interest.[466]

Secondly, the proffering of collaboration as a mechanism for open and transparent communication. Chermayeff argued that effective ARP planning was an outcome of "organic unity," achievable only with early and sustained collective effort by "the People, the Government, the Technicians."[467] He envisioned organizational and communication structures premised on close "collaboration" between the professional and public sectors, including an "architectural central defense committee" to correlate survey findings, formulate standards for wartime architectural and building practices, and serve as a clearinghouse for state and federal agencies requiring architectural services.[468] An outcome of such formalized structures of collaboration, Chermayeff asserted, would be unmediated communication on defense matters between the government and the very "people whose survival or obliteration will depend on the efficacy" of ARP planning. This openness would be further enhanced, he suggested, by shifting discussion and debate on ARP from the exclusivity of technical journals to the more accessible public media.[469]

The third relevant component of Chermayeff's ARP proposal is that, in undertaking such a "responsible" role on behalf of society, architects would not operate in isolation. Chermayeff acknowledged that past efforts by architects -- modernist and historicist alike -- to collaborate with others stumbled over the very disciplinary boundaries separating them.[470] The urgency of war in this instance, Chermayeff argued, mandated that architects overcome these disciplinary obstacles to operate as "correlators" of the findings of teams of specialists, and work in "close collaboration" with "[m]aterial supply sources, Industry, and [l]abor" and with "other scientists and technicians" in the public interest and defense.[471]

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[464] Chermayeff, "Architects and the ARP," second page.

[465] Chermayeff, "ARP and our Office of Civilian Defense," 593; and Chermayeff, "Architects and the ARP," 1-4.

[466] Chermayeff, "Architects and the ARP," 2; and Chermayeff, "ARP and our Office of Civilian Defense," 591.

[467] Chermayeff, "Implications of ARP," 489-490.

[468] Chermayeff, "ARP and our Office of Civilian Defense," 592.

[469] Chermayeff, "Implications of ARP," 490.

[470] Chermayeff, "ARP and our Office of Civilian Defense," 592.

[471] Ibid.

On this point, American Institute of Architects president Edwin Bergstrom concurred, noting that collaboration had failed to gain acceptance as a peacetime working methodology but that in the face of war, the professions needed to set aside disciplinary differences and "collaborate completely if we are to give our country our greatest services." [472] Bergstrom was sufficiently confident in its success that he forecast that working "collaboratively" would become an essential normative practice in a post-war future. As architects, he observed:

> We have all been too prone, probably, to give our clients the impression that we know all the answers; that is far from the truth, and the sooner we all admit it the better off we shall be. . . We must collaborate and coordinate our efforts. We must help each other if we are to achieve our best accomplishments. If one falters, all of us will suffer.[473]

Epistemic Authority and the Sciences

Despite their advocacy, the collaborative participation Chermayeff and Bergstrom sought for architects in pre-war planning did not come to fruition. Moreover, as *Pencil Points* editor Kenneth Reid observed, architects were for the most part marginalized in the war effort. Reid complained bitterly in a 1942 editorial about the seemingly blatant exclusion of architects from key planning and construction assignments, noting that

> Americans all seek to serve their country in time of total war. That includes Architects. Why is there such blind misunderstanding, such stupid opposition to the idea? Why do some Army and Navy offices, dollar-a-year bureaucrats, business men exalted to the position of 'prime contractors', persist in adhering to the sophomoric fable that Engineers are somehow efficient while Architects are impractical, esthetic dreamers, incapable of dealing effectively with the hard-boiled needs of the material moment? [474]

This exclusion of architects and their characterization as "impractical esthetic dreamers" foregrounds an epistemic authority, following Gieryn, long granted to the sciences and science-oriented professions.[475] Architects will never earn such authority, Chermayeff argued, or "win recognition from the general public" as artists.[476] Only through a transformation of the profession modeled on the sciences, he believed, would architects acquire a defining role in decision-making on the environment. As the social scientist Donald Schön discusses in his seminal work on professional practice, this embrace of a scientific paradigm -- along with its concomitant technical rationality privileging systemization over randomness, analysis over intuition, and ostensibly unlimited scientific knowledge as the font of human progress -- was

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[472] Edwin Bergstrom, "Collaboration of the Professions," *Landscape Architecture*, vol. 31 (December 1941), 141.

[473] Ibid.

[474] Kenneth Reid, "Architects are Americans, Too," *Pencil Points* (July 1942), 22. Chermayeff had observed similar marginalization in Britain where architects "apparently, had no contribution to make in a war effort, although paradoxically a modern war is admitted to be largely a technical problem calling for the cooperation of scientists and technicians." This was the continuation of a pattern that had emerged even before the war when "politicians, engineers, surveyors and commerce" took control of responsibilities "long since recognized as our province -- such as city planning, housing, building construction, research in materials, production and assembly, direction of taste, all our most vital and important problems" (Chermayeff, "Crisis in Architecture" (1940), *Design and the Public Good,* 128).

[475] Gieryn, *Cultural Boundaries of Science*, 1.

[476] Chermayeff, "Crisis in Architecture," 131.

foundational to the late nineteenth-century formulation of professions as "mediating between scientific research and social progress," and to the academic institutions that arose to nurture and define them.[477] Concurrent with this formulation, epistemic authority that once resided in the metaphysical and moral realms moved to the natural and physical sciences as they transitioned from a Baconian-based classificatory orientation to an experimental paradigm.[478] With this shift, numerous fields of endeavor, most notably medicine, moved to adopt scientific principles or promote themselves "scientific" with aspirations for authority and credibility.[479] Since then, as Horst Rittel and Melvin Webber observe, professions have been seen as "major instruments for perfectibility," and "conceived as the medium through which the knowledge of science is applied."[480] Abbott notes that professional legitimization is premised on "scientization or rationalization of technique and on efficiency of service" and, similarly, Gieryn writes that in establishing the "epistemic authority" of a profession, "science often stands metonymically for credibility, for legitimate knowledge, for reliable and useful predictions, for a trustable reality."[481] Thus when Frederick Taylor revolutionized the factory by conceptualizing it as a cohesive integration of machine and human components, he contributed to the legitimization of his own engineering profession through the practical application of scientific principles and then, with an eye on monopolistic control, retaining for the engineer the exclusive right to comprehend and implement that application.[482] When his principles of scientific management subsequently crossed into other realms of endeavor as diverse as education and railway management, it served to further burnish the image of engineering as a profession while concurrently perpetuating the epistemic authority of science as the desirable basis of professional knowledge production.[483]

Reinforced by Taylor's studies and Fordist industrial methodologies in the early twentieth-century, scientific epistemic authority reached a critical milestone in the Second World War. Under the direction of Vannevar Bush, Roosevelt's director of the federal Office of Scientific Research and Development, the military-industrial complex in concert with a consortium of research universities applied an array of scientific-based analytical methods -- operations research, general systems theory, and cybernetics -- to a host of wartime objectives such as bomb projectile forecasting, submarine tracking, and ultimately production of the atomic bomb with the Manhattan Project.[484] Given the outcome of the war from an American perspective, it is perhaps not surprising that there arose after cessation of hostilities a pervasive

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[477] Donald Schön, *The Reflective Practitioner: How Professionals Think in Action* (New York: Basic Books, 1983), 338.

[478] Kimball, 204-205; and Michael Gibbons, Camille Limoges, et al., *The New Production of Knowledge* (London: SAGE Publications, 1994), 2.

[479] The application of scientific principles, for instance, prior to the First World War to surgical procedures and disease research transformed a scattering of unorganized occupations into the medical profession, with discernible and credible links in the public consciousness to human well-being (Rosemary Stevens, *In Sickness and in Wealth: American Hospitals in the Twentieth Century* (New York: Basic Books, 1989), 52-56; and Joseph R. Gusfield, "Nature's Body and the Metaphors of Food," in Michèle Lamont and Marcel Fournier, eds., *Cultivating Differences: Symbolic Boundaries and the Making of Inequality* (Chicago: University of Chicago Press, 1993), 78.

[480] Horst W. J. Rittel and Melvin M. Weber, "Dilemmas in a General Theory of Planning," *Policy Sciences*, vol. 4 (1973), 158.

[481] Abbott, 195; and Gieryn, 1.

[482] Haber, 305.

[483] Stevens*, In Sickness and Wealth*, 75.

[484] Vannevar Bush, "Professional Collaboration," *Science: New Series*, vol. 125, no. 3237 (11 January 1957), 52.

confidence, as expressed in Bush's "endless frontier," in applying rationalized scientific-based methodologies to problems of any type, scale or complexity. [485]

Chermayeff's own quest for epistemic authority encompassed two principle themes: confidence in the sciences to manage technology for societal benefit, and a certainty that the adoption of scientific methodologies bolstered by collective action would enable architects to fulfill their societal obligations as professionals. As to the first theme, Chermayeff readily acknowledged the substantive benefits attributable to technology, citing as examples power production and distribution systems, the emergence of iron as a reliable building material, transportation networks for the movement of workers, and methodologies for the pre-fabrication and mass production of consumer goods.[486] Yet, as with many of his collective action colleagues -- an assortment of architects, artist, intellectuals, and scientists with otherwise disparate modernist visions -- the shared concern was that technological advances might outpace existing socio-economic norms.[487] This condition made it difficult for society, in Chermayeff's words, to "obtain the full benefits of the work of our scientists and inventors." [488] With the onset of the Second World War and memories of previous world war still intact, Chermayeff joined a chorus of forces in asserting that technology unchecked was a destructive force; that to derive the fullest societal benefits, it must be subordinated to human needs and control for a "good constructive purpose." [489] Chermayeff observed:

> If man were to apply his artistry, scientific and technical knowledge to the production of housing at the same level he is now applying these to the production of tools of destruction . . . one of the world's greatest problems will have been solved.[490]

Chermayeff's overt confidence in the sciences owed much to his contact in the 1930s with the British scientific community, particularly with members of the Social Relations of

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[485] As Schön wrote of this period: "If a great social objective could be clearly defined, if a national commitment to it could be mustered, if unlimited resources could be poured into the necessary research and development, then any such objective could be achieved" (Schön, 37). The heightened confidence in science and technical rationality manifested itself in increased funding to research institutions after the war and, as Stephen Graham and Simon Marvin demonstrate, massive public investment in intricate infrastructural networks "to facilitate the mass production, distribution and consumption of standardized goods along the lines of Fordist methodologies." Stephen Graham and Marvin Simon, *Splintering Urbanism: Networked Infrastructures, Technological Mobilities and the Urban Condition (*London and New York: Routledge, 2001), 41).

[486] Serge Chermayeff, "New Materials and New Methods" (1933), *Design and the Public Good*, 22. Well before Chermayeff first lectured on the topic in the 1930s, industrialization had been implicated in the polemics on modernity and its ramifications for national identity, politico-economic structures, social order, and the environment. In 1845, Friedrich Engels drew vivid linkages between the decayed industrialized condition of early nineteenth-century Europe and the "nameless misery" of those trapped in its midst. Some seventy years later, the human and physical devastation of the First World War -- facilitated by advances in warfare technologies -- reinforced pervasive concerns about the societal and environmental costs of industrialization, concerns that contributed to the rise of disparate intellectual, artistic, and political movements all competing to implement their transformative modernist visions.

[487] Chermayeff, "The Architect and the World Today," *Design and the Public Good*, 118; and Chermayeff, "New Materials and Methods," *Design and the Public Good*, 22.

[488] Chermayeff, "The Architect and the World Today," *Design and the Public Good*, 118; and Chermayeff, "New Materials and Methods," *Design and the Public Good*, 22.

[489] Serge Chermayeff, "World Peace" (1949), *Design and the Public Good*, 33.

[490] Ibid., 34.

Science.[491] Through a prolific program of lectures and writings, these scientists, including Hyman Levy, Julian Huxley, J. Desmond Bernal, JBS Haldane, and Lancelot Hogben, engaged in public dialogue on a critical nexus amongst science, technology, and the human condition. Lancelot Hogben -- whose assertion that "an architect is a scientific humanist, but a humanist above all" was of great interest to Chermayeff -- popularized the discussion with *Science for the Citizen* in 1938, and Bernal stirred the debate on modernism and scientific motivations toward societal good with *Social Function of Science* in 1939.[492] As was common amongst British artists in the 1930s, for Chermayeff the writings and lectures of these acquaintances resonated with the unlimited scientific potential to develop practical solutions for most any societal need.[493] Applied to architecture, this potential suggested for Chermayeff that the adoption of decidedly collective scientific methodologies would transform and sustain the architectural profession as a mediating force between the environment and the human condition. The "design of structures," he stressed in a 1935 address to the students' section of the Architects and Technicians Organisation, "is not merely a variation in aesthetic principles. . . It is the expression of an earnest desire of intelligent and highly trained people to change living conditions in proportion to the immense strides made in general education, medicine, and applied technique."[494]

On this point of architecture as a transformative force, Chermayeff found much common ground amongst American collective action groups after his relocation to the United States, a lengthy list that includes the Independent Citizens' Committee of the Arts, Sciences, and Professions (with Thomas Creighton, Talbot Faulkner Hamlin, Henry Churchill, and Clarence Stein), the Architects Committee of the National Council of Soviet-American Friendship (with Vernon De Mars, William Wurster, Kenneth Reid, Talbot Faulkner Hamlin, Joseph Hudnut, and Richard Neutra), and the American Society of Planners and Architects (ASPA), having attended the first official meeting in 1944 with DeMars, Wurster, Marcel Breuer, Louis Kahn, Elizabeth

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[491] Robert E. Filner, "The Roots of Political Activism in British Science," *The Bulletin of Atomic Scientists*, vol. 32, no. 1 (January 1976), 24.

[492] Serge Chermayeff, "False Gods," (1941), *Design and the Public Good*, 140; Serge Chermayeff, "Thinking about the Thirties," (1979), *Design and the Public Good,* 215; and Brenda Swann and Francis Aprahamian, *J. D. Bernal: A Life in Science and Politics*, Verso (1999).

[493] More broadly, Powers notes that the, "artistic culture of 1930s England was much in awe of science, hoping to find a universal methodology within it that would assist in solving problems in other fields, an alternative way of reaching the bedrock of reality" (46). Ziman offers that such a "confidence in ceaseless expansion is much more than a general belief in scientific 'progress' – that is, the accumulation of more valid scientific knowledge and more effective technological capabilities. It assumes there will always be room in the future for good new ideas, good new people and good new enterprises, regardless of what happens to older ideas, older people and older institutions" (Ziman, 79).

[494] Chermayeff, "The Architect and the World Today," *Design and the Public Good,* 118.

and Rudolph Mock, Eero Saarinen, Henry Wright, and Jose Luis Sert.[495] Through the ASPA, initiated as an alternative to the AIA, he also had contact with the CIO-affiliated Federation of Architects, Engineers, Chemists, and Technicians (FAECT), formed in 1933 to protest restrictive wage guidelines proposed by both the AIA and American Society of Civil Engineers for the employees of architectural and engineering firms.[496]

Of particular interest is Chermayeff's contact during an extended stay in the San Francisco Bay Area with the Telesis Environmental Group, founded in 1939 by DeMars, Jack Kent, Francis Violich, Corwine Mocine, Garrett Eckbo and Geraldine Knight Scott. Modeled in part on MARS for "its attempts to influence a wide circle of fields," the group brought an explicitly interdisciplinary approach to emerging social and environmental concerns. [497] In a 1942 article on Telesis, Chermayeff depicted the group's formation as an "important chapter" in the development of modern architecture and planning, offering "signs of promise of new things which will preserve and enrich decent human values in spite of civilization's temporary aberrations."[498] Of interest is that Chermayeff appended to his article the Telesis declaration of purpose, which articulates its formation "in a spirit of cooperation and personal anonymity so that by collaboration in our efforts we may encourage scientifically significant work."[499] This was a spirit of "cooperation" and "collaboration" that, contemporaneous with Chermayeff's own

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[495] Edwin S. Smith correspondence to George Howe dated 6 January 1944 , Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 6: Howe; Harvey Wiley Corbett correspondence as chairman to the membership dated 29 May 1944 listing DeMars, Goodwin, and Hamlin as vice-chairmen, and Chermayeff, Hudnut, and Reid amongst others as members of the executive committee, Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 27: Associations and Committees, 1946/1953, Nat'l Comm./ Arts; Hannah Dorner correspondence to numerous recipients dated 1 November 1946, Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 27: Associations and Committees, 1946/1953, Nat'l Comm./Arts; Vernon DeMars correspondence to Committee Members dated 31 March 31 1952, Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 27: Associations and Committees, 1944/1952, Architectural Committees; and Andrew M. Shanken, "Between Brotherhood and Bureaucracy: Joseph Hudnut, Louis I. Kahn and the American Society of Planners and Architects," *Planning Perspectives*, vol. 20, no. 2 (April 2005), 150.

[496] FAECT was, more broadly, a response to the widely held anti-union sentiment gaining traction amongst professional societies as the growing class of technical workers fueled by the corporate embrace of science and technical rationality sought to protect their own interests. FAECT organizers endeavored to gather under a single umbrella architects, engineers, scientists, and technicians along an agenda that was sufficiently radical to attract the attention of the United States War Department, though an investigation of possible Communist activity amongst FAECT members at the Berkeley Radiation Laboratory at the University of California ultimately concluded that membership in the labor organization did not in fact equate with Communist affiliation or sympathy (Russell Olwell, "Physical Isolation and Marginalization in Physics: David Bohm's Cold War Exile," *Isis*, vol. 90, no. 4 (December 1999), 741; Robert Heifetz, "The Role of Professional and Technical Workers in Progressive Social Transformation," *Monthly Review*, December 2000; and Tony Schuman, "Professionalization and the Social Goals of Architects: A History of the Federation of Architects, Engineers, Chemists, and Technicians," in Paul Knox, ed., *The Design Professions and the Built Environment* (Tulsa, OK: G.P. Courseware, 1991).

[497] Memorandum dated 1 November 1939, Telesis collection, Bancroft Library Archives at the University of California (Berkeley). Chermayeff worked professionally with several of the Telesis members during this period. He developed a prototype apartment project for MOMA with DeMars in 1945, and worked with Ernest Born and Eckbo on the Walter Horn house in Richmond, CA (Powers, 175, 224-225, and 273). In 1942, Chermayeff contributed to the Mayhew house in Piedmont, CA, and joined with DeMars and Susanne Wasson-Tucker on a housing scheme for "The House in its Neighborhood" for the MOMA "Tomorrow's Small House" exhibition (Powers, 221-224 and 228).

[498] Serge Chermayeff, "Telesis: The Birth of a Group," *New Pencil Points* (July 1942), 45-46.

[499] Ibid., 48.

transition to teaching that decade, was to cross from practice to academia with the founding by some Telesis members of the Department of City and Regional Studies at the University of California (Berkeley) in 1948, and subsequently the College of Environmental Design in 1959 under William Wurster as a laboratory for "effective and intelligent collaboration."[500]

Transition to Academia

All of the groups with which Chermayeff associated prior to the Second World War had assembled around great enthusiasm for their causes and for the potential of their collective action. Each ultimately collapsed from the burden of conflict, as Chermayeff later noted, between "collective intentions and the individual concern with the immediate present."[501] The varied experiences nonetheless grounded Chermayeff in a communal approach to the built environment and the human condition, an approach encouraging the free exchange of ideas, talents, and time. Of equal importance, he retained a belief in collective action as a counterpoint to the individualist and specialist tendency of technical rationality. These are the themes, as I will discuss, that Chermayeff carried forward in the 1940s as he transitioned from active architectural practice to academia.[502]

Chermayeff failed to secure a teaching position alongside his Telesis colleagues at Berkeley but subsequently received an appointment at Brooklyn College in New York, where he served as director of the newly-formed Department of Design from 1942 to 1947.[503] While bearing some resemblance to the Telesis program, Chermayeff's nascent pedagogy at Brooklyn flowed principally from his own harsh critique of the architectural profession, which he saw as monopolized by "lounge lizards" selfishly catering to the "individualist" interests of client.[504] His criticism extended as well to the prevailing standards of academic training, which, he

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[500] Vernon DeMars, "Planning: The Educational Problem," *JAE*, vol. 13, no. 2, ACSA-AIA Seminar: The Teaching of Architecture (Autumn 1958), 26.

[501] Serge Chermayeff, "Institutions, Priorities, and Revolutions" in *The Future of Professionals in the Built Environment, three papers presented at Harvard Graduate School of Design's Annual Conference on the Professions co-sponsored by the Graduate School of Design and the Boston Globe, Cambridge, MA, May 1, 2 and 3, 1974* (Cambridge: Fellows of Harvard College, 1974), 12.

[502] Powers notes that Chermayeff's "productivity from the 1940s to the 60s was certainly nothing like the pre-war level but he produced a reasonable body of work" (221). In addition to his San Francisco Bay Area projects with Telesis members, he prepared a hypothetical "Park Apartments" design with Peter Blake, Abel Sorensen, Norman Fletcher and Henry Hebbeln (227). From 1950, his projects were predominantly small houses and his "last major work," according to Powers, was his New Haven residence completed in 1963 (231 and 242).

[503] Chermayeff also made inquires in this same period about teaching opportunities at Yale, Harvard, and Oregon. His colleagues at the Department of Design included Gyorky Kepes, Burgoyne Diller, and Arshile Gorky.

[504] Chermayeff, "The Architect and the World Today," *Design and the Public Good,* 117. In an equally sweeping condemnation thirty years later, he submitted that architects remained unprepared to serve society, and in the face of ever more complex environmental challenges were "faithless cowards of the worst kind," leading to their marginalization in decision-making on the environment. Serge Chermayeff, "Architectural Condition" (1964), *Design and the Public Good*, 189; and Chermayeff, "Design as Catalyst," 64-65. In a speech at the University of Illinois (Urbana), Chermayeff observed the irony "that in an age in which man is indeed transforming his environment at a pace unprecedented and in quantities unprecedented, the group of professionals who by definition are among the prime shapers of man's habitat, are deprived of prime responsibility, namely to make decisions. The trained shaper of the environment is in a subservient position, and this true of all declarations and slogans of the professional organizations or the very arrogant assertions of a few favored individuals" (Chermayeff, "Design as Catalyst," 66.

claimed, fostered an "obsolete" image of the architect as an artist operating in a "separated professional compartment."[505] The consequence of these dual conditions, according to Chermayeff, was that society regarded the

> architect either as a gentleman, doing a gentleman's job and living a gentleman's life of polite conformity to an unchanged culture, or as an eccentric artist, whose decisions on matters . . . need never be questioned because their significance is purely formal and superficial.[506]

Dismissive of the architect-artist paradigm as anachronistic in an industrialized world, in his emerging pedagogical strategy Chermayeff aspired for architects to be "fully cognizant of the sociological and technical needs in an enormously broadened field of design generally," a field enveloping multiple disciplines engaged with the built environment.[507] Architects have long endeavored with varying degrees of success to describe such an ethereal field of activity and its effect on architectural production, employing an assortment of quasi-synonymous terms from "total" to "unity" to "wholeness." As Mark Wigley notes, even Gropius found elusive a single term to adequately capture the "oneness of a common idea," employing at various times "incorporation," "welding," "synthesis." and "interwoven."[508] At moments in his own career, Chermayeff used the terms "organic unity", "integration," "amalgam," "bridgings," and "boundary-crossings" to describe the extraordinary promise of the "beauty of nature and art . . . join[ing] the elegance of science."[509] In his initial foray into academia, Chermayeff submitted curricular recommendations in 1941 to Berkeley and Stanford reflecting some influence of the Telesis interdisciplinary approach to problem-solving. In these recommendations, Chermayeff articulated as problematic in both academia and practice the distilling of design problems to their constituent parts, with each sub-problem assigned to a specialist. He sought instead to broaden architectural thinking, for architects to see the built environment in the context of an

> organic unity of all design problems and their relationship to other sciences, humanities and the arts. . . This segregation has been, for the most part, deliberately preserved by entrenched academicism and boom-time practitioners. It has further been intensified by blind specialization with its lack of exchange of ideas and close cooperation between specialists as well as between those and the general public.[510]

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[505] Chermayeff, "The Architect and the World Today," *Design and the Public Good*, 119; and Serge Chermayeff, "Contemporary Planning, Architecture, Design, and Design Education" (1941), *Design and the Public Good*, 242.

[506] Serge Chermayeff, "Crisis in Architecture," *Design and the Public Good*, 129.

[507] Ibid., 131-132.

[508] Wigley, 2.

[509] Chermayeff, "Institutions, priorities, and revolutions," 23; and Serge Chermayeff, "Values and Ethics" (1978), *Design and the Public Good*, 303. Chermayeff used the terms "bridgings and boundary-crossings" to describe the interdisciplinary academic work in the natural and social sciences that might serve as a model for the training of the design professions under an umbrella -- as Lawrence Anderson once described it -- of environmental design (Chermayeff, "Design as Catalyst," 68; and Lawrence B. Anderson, "The Environmental Design Umbrella," *JAE*, vol. 21, no. 5 (1967), 5. Later, in *Shape of Community*, he and Tzonis wrote that: "A new bridge-building is necessary; this amounts to intellectual exchanges between sociology, methodology, and technology, the goals and the means." (Serge Chermayeff and Alexander Tzonis, *Shape of Community: Realization of Human Potential* (New York: Penguin Books, 1971), 174).

[510] Chermayeff, "Contemporary Planning, Architecture, Design, and Design Education," *Design and the Public Good*, 242.

At Brooklyn, Chermayeff endeavored to mold this notion of an organic unity into a curriculum emphasizing, in his words, an "over-all view rather than the partial approach" to the built environment.[511] Although he achieved only limited success in this direction in his short five-year tenure there -- Powers notes that the design curriculum included art history, mechanical drawing, photography, crafts, colour, printing, architecture, stage design, and urban planning -- Chermayeff's pedagogical objective was clear: delineation of a broad field of endeavor beyond the normative boundaries of architecture and the erasure of existing disciplinary boundaries.[512]

The principal point underlying Chermayeff's objective is that Fordist tendencies toward division of labor and specialization are inalterably in opposition to collective action. By inhibiting communication across disciplinary lines -- a prerequisite to any sort of unified action -- these tendencies nurture divisiveness instead of unity, isolation instead of collective effort, and ineffectiveness and competition rather than efficiency. Why in a society already challenged by cultural distinctions, Chermayeff asked, should there be continued reliance upon artificially-constructed barriers that only exacerbate and perpetuate difference?[513]

> The problem of our time is that we do not know who anybody is -- there is such a babel of tongues speaking about everything, removed in time and space. There is no specific culture. We are simply made aware that every culture, or every product of every culture is accessible to us should we take the trouble. This means that diversity, diversification, variety, uncertainty rather than discipline, dogma, belief, faith, common experience are the rule.[514]

The re-integration of splintered professions into a single comprehensive field of design, he argued, would eliminate the "questionable distinctions" long preventing architecture and the specialized design disciplines from unified action.[515] He intimated this as early as 1939, when he cast about for a global term that might encompass "town planning, construction building in the architectural sense . . . as apart from engineering industrial design, the study of materials, and so on" and called for the incorporation into architectural curricula "geography, geology, sociology, and sciences which are concerned with the movement of peoples and the development of rational groups." [516] The following year in a lecture at Harvard, he experimented with the term "environmental design," suggestive of a unified and expanded field of action that might "embrace all problems of shelter and its equipments and their relationships." [517]

With his subsequent appointment in 1947 as director of the Institute of Design (ID) in Chicago (1947 to 1950), Chermayeff sought to further develop a curriculum in support of an integrated field of activity, and to embed into that field scientific principles and collaborative

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[511] Serge Chermayeff, "Excerpts from Report to the President of Brooklyn College 1942," Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, as cited by Powers (149).

[512] Powers, 150.

[513] Chermayeff, "Design as Catalyst," 64.

[514] Serge Chermayeff, transcript of remarks from "Symposium on the Integration of the Arts," 8 February 1954, Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 36: Writings and Presentations, Harvard 1955, 3.

[515] Chermayeff, "Design as Catalyst," 66.

[516] Serge Chermayeff, "Training for What?" (1939), *Design and the Public Good*, 235.

[517] Chermayeff, "Crisis in Architecture" (1940), *Design and the Public Good,* 132.

methodologies.[518] In his inaugural address at ID, Chermayeff recounted that the "impact of the industrial revolution on the nineteenth century, with the tremendous acceleration of scientific and technological development, and the expansion of economic frontiers, was of almost explosive character and force."[519] To serve as "contributing functionaries" in such an industrialized world, he argued, architects would need to abandon their "pre-industrial" and "pre-scientific" training and practices exemplified by the "qualitative disparity" between houses and their mechanical contents.[520] "We are at the moment," Chermayeff observed, "putting into our dwellings all kinds of complex equipment which we consider the prerogative of civilized man, which particularly here in America is produced at the highest level of technology. We are building around this high technical level equipment structures which are, relatively speaking, primitive. In some case, they are positively archaic.[521]

The curriculum at ID had already undergone re-organization prior to Chermayeff's arrival so as to de-emphasize artistic individuality in favor of more structured attention to the sciences and literature.[522] Whereas Moholy-Nagy had founded ID ten years earlier to promote design as the "dynamic relationship between art and science, revealed and materialized through technology," Chermayeff now pursued a new strategy framed by the sciences as a model and motivated by a societal role for the architectural profession.[523] The curriculum at ID, he noted, would measure "every phase of existing practice against the yardstick of scientific knowledge, technical efficiency and plastic sensibility of the highest order," and to re-purpose in students' minds architectural production for societal good in preference to "lesser requirements of technical and business efficiency."[524] Exemplifying this strategy and the "uniqueness" of the ID program from Chermayeff's view was the Foundation Course required of first-year students.[525] Under the tutelage of an array of instructors, including former Moholy-Nagy student Richard Filipowsky, Hugo Weber, and Emerson Woelffer, students experimented with an array of materials and visualization methods in a manner that contrasted sharply with traditional Beaux-Arts influenced programs, where, in Chermayeff's words, the study and/or mimicry of "historic

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[518] Organized as the New Bauhaus under László Moholy-Nagy in 1937, re-formulated as the School of Design, then, in 1944, transformed into the Institute of Design with financial backing from Walter Paepcke, the chairman of Container Corporation of America (Powers, 175). The Illinois Institute of Technology later absorbed ID just prior to Chermayeff's departure.

[519] Serge Chermayeff, "Education Toward Modern Design," (1947), *College Art Journal*, vol. 6, no. 3 (Spring 1947), 219.

[520] Serge Chermayeff, "Architecture at the Chicago Institute of Design" (1950), *Design and the Public Good*, 251. Chermayeff also colorfully depicted these practices as "perverted and degraded" (252).

[521] Serge Chermayeff, pamphlet entitled "Three Addresses [by Ludwig Mies van der Rohe, Serge Chermayeff, and Walter Gropius] at the Blackstone Hotel, April 17, 1958 on the occasion of the celebration of the addition of the Institute of Design to Illinois Institute of Technology," Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 33, Institute of Design: Writings and Presentations, 1950.

[522] Colleagues included architects George F. Keck, Ralph Rapson, Robert Tague, photogrpaher Nathan Lerner and artist Charles Niedringhaus, the latter two amongst the first graduates of the ID program in 1942 (Chermayeff "Architecture at the Chicago Institute of Design," (251); Powers, 175; and Alain Fendeli, "Moholy-Nagy's Design Pedagogy in Chicago (1937-46)," *Design Issues*, vol. 7, no. 1 (Autumn 1990), 6).

[523] Findeli, 9-10.

[524] Chermayeff, "Architecture at the Chicago Institute of Design," *Design and the Public Good*, 253, partially cited in Dean Hawkes, "The Shaping of Architectural Research," *ARQ*, vol. 5, no. 3 (2001), 206.

[525] Chermayeff, "Architecture at the Chicago Institute of Design," *Design and the Public Good*, 253; and Findeli, 107.

eclecticism" was a principle basis of study.[526] "So we have to spend from about a year to a year and a half," Chermayeff complained, "undoing the immense harm that our education system has done to the people who we consider will become important functionaries in our society...in other words, we have to start all over again."[527] Chermayeff's objectives for the Foundation Course mirrored those he held for the overall ID curriculum, to "produce a new professional, capable of presenting basic, functional factors underlying design, rather than the remedial or compromising post-facto services now rendered by engineer-technicians to the designer-artist."[528]

Collaboration Defined and Contrasted

Of importance here is that the Foundation Course relied upon three core activities: experiment ("free manipulation of media, materials, and tools), control ("mastery of technique"), and application ("development of scientific method)," the latter bearing an emphasis on the "interrelationship" amongst fields of endeavor.[529] It is in this emphasis on "interrelationship" at ID that we begin to see some clarity in Chermayeff's position of collaboration. This is best considered by comparison with Gropius' teamwork-collaboration, which was instrumental to the Bauhaus as a model for Moholy-Nagy's founding of ID, and the early techno-collaboration of Konrad Wachsmann, who had a brief but contentious tenure at ID alongside Chermayeff.

While it was Chermayeff's objective upon taking over the helm at ID to "bring the original intention of Gropius up to date," the two architect-educators maintained rather different positions on collaboration.[530] Gropius' oft-repeated twelve-point prescription for architectural education encouraged teamwork so as to prepare students as "coordinators" of the multiple disciplines engaged in architectural production.[531] This prescription surfaced, for instance, in Gropius' discussion of post-war reconstruction programs, noting that the architect as "co-ordinator by vocation should lead the way -- first in his own office -- to develop a new technique of collaboration in teams."[532] His earlier Bauhaus proclamation that the "ultimate aim of all visual arts is the complete building," coupled with promotion of the architect as coordinator of multi-disciplinary teams, suggests an effort to re-assert the dominance of architecture over the

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[526] Chermayeff, "Architecture at the Chicago Institute of Design," *Design and the Public Good*, 252.

[527] Chermayeff, "Fine Arts in General Education," contribution to conference at Midwestern College of Art, 10-12 November 1949, Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, as cited in Powers, 177.

[528] Chermayeff, "Architecture at the Chicago Institute of Design" (1950), *Design and the Public Good*, 254.

[529] Ibid., 253-254.

[530] Serge Chermayeff correspondence to Hans Wigler dated 6 October 1957, as cited in Powers, 177. Powers comments: "In running an architectural curriculum (at Institute of Design) on a more comprehensive scale than at Brooklyn, Chermayeff came close to realizing his ideal of the integration of science and art, starting from the first principles without reference to existing methods of architectural teaching."

[531] *Proceedings*, *36th Annual Convention of the Association of Collegiate Schools of Architecture, JAE*, vol. 6 (Spring 1951), 86; and Siegfried Giedion, *Walter Gropius: Work and Teamwork* (New York: Reinhold Publishing Corporation, 1954),15.

[532] Walter Gropius communication to Winston Weisman cited in "Group Practice," *Architectural Review*, vol. 114 (September 1953), 149.

allied arts in this model of integrative activity, with collaboration as a means of communication and information exchange across disciplinary and functional barriers.[533]

Wachsmann sought from a technological perspective to identify the optimum conditions for such disciplinary exchange, having concluded that the "contradictions, uncertainties, and difficulties" of industrialized society precluded effective individual action.[534] Problem-solving for Wachsmann was best achieved by "anonymous collaboration, in which all preconceived opinions and notions of design are voided and the best available resources and scientific knowledge freely applied."[535] Moving beyond mere abstract notions, he sought to dissect the means and methods of collaboration as a working methodology drawn from his research studies with students, initially at ID and subsequently at other institutions. In *The Turning Point of Building*, Wachsmann carefully prescribes the optimum physical and operational conditions for collaboration, including the number of participants (twenty-one), working periods (seven), sub-problems to be addressed (seven), furniture arrangements (a "cluster" of four drawing boards), and waste baskets (none, since all documentation is to be archived).[536]

Wachsmann's pragmatics of collaboration held no interest for Chermayeff -- he was unsure how it might be taught -- and he rejected Gropius' presumption of the architect's authority in collaborative undertakings.[537] In this insistence, he saw only needless perpetuation of the myth of the architect's pre-eminence. Chermayeff instead saw the architect as a critical but not necessarily dominant participant in collaborative undertakings. Of the Gropius position, he queried:

> What endows the Architect apparently automatically, with such advantage over his fellow man? The fact of choosing the now fashionable profession? The traditional training, the validity of which is being questioned everywhere by honest educators? The ability to

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[533] Walter Gropius, "Programme of the Staatliches Bauhaus in Weimar," in Ulrich Conrad, ed., *Programs and Manifestoes on Twentieth-Century Architecture*, tr. Michael Bullock (Cambridge: MIT Press, 1970), 49. Alofsin suggests that Gropius had transformed the "GSD's original concept of collaboration -- architects, landscape architects and planners working toward a common goal" into an altered vision of teamwork in which the architect is "supported by other disciplines." (Alofsin, 222).

[534] Konrad Wachsmann, *The Turning Point of Building: Structure and Design* (New York: Reinhold Publishing Corporation, 1961), 135. Wachsmann and Chermayeff shared an office in New York while Chermayeff was teaching at ID. Both had an interest in large-scale housing projects and agreed that prevailing construction methodologies failed to maximize available technological developments, leading to Wachsmann's unsuccessful efforts with the General Panel Corporation with Gropius (Konrad Wachsmann, "Society and Design Seminar, Part II: The Physical Environment, The Means for Design," 8 April 1948, Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 33: Reference Files, Institute of Design, 1948. Despite this broad agreement, there were tensions between Chermayeff and Wachsmann over teaching responsibilities at ID and the nature and character of architectural research, prompting Chermayeff to seek guidance from Gropius (Chermayeff correspondence to Walter Gropius dated 16 May 1951, Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 6: Gropius).

[535] Konrad Wachsmann, "Society and Design Seminar, Part II;" and Wachsmann, *The Turning Point of Building*, 186.

[536] Ibid., 204-207.

[537] Boyle captured this point when asked with regard to a unified field of practice, "[w]as the architect alone to integrate all necessary knowledge, or was the architect to be a member of a team which integrated all necessart knowledge through its components? And the corollary of that question was: Would the architect be sole master of all areas of decision in the building process, or would decision-making be shared with others? (Boyle, "Architectural Practice in America," in Kostof, 337-338).

> sketch charmingly? The claim to creative leadership can hardly be established, ipso facto, on such a slippery base.[538]

Beyond the question of authority, considerable differences exist between Chermayeff and Gropius on the composition of collaborative undertakings. When Gropius spoke of teamwork-collaboration, he envisioned disciplines intimately related to architecture such as the visual arts, but was not prepared, as Anthony Alofsin notes, for "full democratic participation" of certain disciplines -- for instance, landscape architecture and planning -- that he believed fell outside the architectural realm.[539] Chermayeff similarly used the term collaboration selectively but was skeptical about its promotion by Gropius as a unifying methodology for architects and artists. Although a self-proclaimed "second-hand artist," Chermayeff dismissed as a "fallacy" the notion of architecture as art, but in the abstract was not unsympathetic to a view of art as vital to architecture.[540] In fact, he was confident that art and science were compatible in architecture and voiced with many of his modernist colleagues aspirations to get "the arts of architecture, painting, and sculptor act coherently and concisely together."[541] Yet the mere act of working "coherently and concisely together" -- an optimized condition Wachsmann sought to master through his studies -- did not for Chermayeff immediately constitute collaboration. To the contrary, and in opposition with the views of La Farge and Lescaze from previous chapters, he saw artists as unsuitable collaborators for architects, in part because they were less subject to market pressures, allowing them to be "independent and aloof until the work is completed."[542] In an era lacking the "cultural cohesion" of the pre-industrial past, he could not see how the long idealized architect-artist cohesion might be realized through collaboration. In an industrialized society, Chermayeff observed, in which

> artists exist in an ever growing isolation and speak in tongues not even comprehensible to each other, how shall an architect choose a mate and have confidence in their joint issue? How can the average architect or technician, who changes his own artistic and business

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[538] Serge Chermayeff correspondence to Douglas Haskell, 4 June 1952, Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 6: Haskell. In his interpretation of this paragraph, Powers suggests that Chermayeff was channeling the early ideas of Gropius "in opposing an introverted and self-sufficient culture of architecture, but that Gropius himself had gone over to the enemy side" (Powers, 179). Boyle asks with regard to an integrated field of practice: "Was the architect alone to integrate all necessary knowledge, or was the architect to be a member of a team which integrated all necessary knowledge through its components? And the corollary of that question was: Would the architect be sole master of all areas of decision in the building process, or would decision-making be shared with others? (Boyle, "Architectural Practice in America," in Kostof, 337-338).

[539] Alofsin notes that Gropius's 1950 "Blueprint for an Architect's Education" prescribed collaboration between the architecture and city planning departments but excluded landscape architecture (240).

[540] Serge Chermayeff, transcript of remarks from "Symposium on the Integration of the Arts," 8 February 1954, Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 36, Writings and Presentations, Harvard 1955, 2. Partially re-printed as Serge Chermayeff, "Framework for the Arts" (1955), *Design and the Public Good*, 161. "What we really need," Chermayeff argued, "is a field of action within which people may humbly work in order to produce things corresponding to identified needs and designs. If there be artists participating in this program, we shall then have art. If there are no artists participating in this program, we will get some quite adequate but perhaps hideous tools." Serge Chermayeff, "Design and Transition," (1957), *Design and the Public Good,* 165.

[541] Chermayeff, "Symposium on the Integration of the Arts," 2. Plunz notes that the "debate on the relationship between artists and architect was fashionable in the fifties (105).

[542] Serge Chermayeff, "Summary of statement by Serge Chermayeff on the relationship of the Visual Arts (1948), Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 20: Presentations, 2.

habits as frequently as he changes his automobile, please himself, his clients and his reviewers, by adding an artist collaborator to his already considerable complications?[543]

Paul Damaz, an architect writing in the 1960s about artistic collaborations, saw this important distinction. He noted that architects readily turn to, and typically rely upon, an array of consultants for technical advice -- structures, mechanics, acoustics, etc. -- but warily approach artists for input. "We must admit," Damaz wrote, "that architects and artists live in different worlds and have great difficulty understanding each other." [544] That artist and architects might co-exist in parallel worlds was not lost on Chermayeff, who concluded that insofar as artists are concerned, the "only thing that I . . . can see is not therefore the collaboration as a pattern but a cultivation of the integration of the arts as such." [545]

This foregrounds two principal aspects of Chermayeff's iteration of collaboration. First, for all his talk of integration and organic unity, Chermayeff saw collaboration as an ineffective response to pervasive specialization in the design professions. Following Schön, architectural problems under this business model were divisible into sub-problems -- aesthetics, static loads, temperature control, noise transmission, etc. -- each of which corresponded directly to sub-fields of knowledge in a highly segmented division of labor.[546] In his critique of professional practice, Chermayeff contended that through its emphasis on individualism, specialization masks the underlying collective nature of architectural production -- that is, the requisite application of diverse skills and knowledge to the design and construction of an edifice -- in favor of the idealized solitary hero promoted by academia and the media. These specialist and individualist tendencies precluded unity of effort amongst the design disciplines -- architecture, visual arts, industrial design, graphic design, etc. -- thereby rendering them ineffective and marginalized in decision-making concerning the built environment. Rather than promote collaboration amongst these disciplines, he called for an end to "the myth of the artistic separateness, for the abandonment of the star system which tries to manufacture excellence like any other commodity" and for the erasure of disciplinary boundaries in what he saw as essentially a single set of concerns: environmental design.[547]

While opting for the erasure of disciplinary boundaries amongst the design professions, Chermayeff still turned to collaboration as the basis of relations for a carefully prescribed circle of synthesized architect/designers, scientists, and technicians operating in the built environment. To a great extent, Chermayeff's objectives here mirrored those he had set out for air raid precaution planning in the Second World War. For ARP, he envisioned architects participating with scientists, economists and others in an organic unity of effort, a unity enabled and facilitated by collaboration and uninhibited knowledge exchange fashioned on a commonality of objective, language, and scientific methodology.[548] The enormity and multi-faceted complexities of the

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[543] Ibid., 2-4.

[544] Paul Damaz, "Art as an Architectural Element," *AIA Journal*, vol. 46, no. 5 (November 1966), 556.

[545] Chermayeff, "Symposium on the Integration of the Arts," 3.

[546] Architectural historian Winston Weisman observed in 1953 that post-war architectural practice had dramatically changed from the prototypical individual practitioner of the prior century "who personally thought out the plan, executed the design and supervised the construction" to the twentieth-century iteration that was merely "one part of a complex mechanism" Winston Weisman, "Group Practice," *Architectural Review*, vol. 114 (September 1953), 146.

[547] Chermayeff, "Design as Catalyst," 68.

[548] Chermayeff, "Crisis in Architecture," (1940), *Design and the Public Good,* 131.

built environment, Chermayeff argued, mandated a similar strategy, employing the same communication and networking techniques realized by the scientific community during the Second World War. What Chermayeff sought was something akin to the "communicative transparency" that motivated contributors to the *Bulletin of the Atomic Scientists* after the Second World War, a bipartite move toward openness and exchange of ideas amongst scientists enabled by network technologies, and between the scientific community and society at large to minimize the prospect of misappropriating scientific knowledge for destructive purposes.[549]

Collaboration in this context was no longer the physical outcome of architectural production, as with the La Farge historicist or Lescaze modernist iterations objectifying a perfect unity of form inspired by the Renaissance. Chermayeff's iteration instead de-couples collaboration from physical manifestation and re-constitutes it as a means to a stylistically-neutral outcome. It was, however, no mere linear act of communication across disciplinary lines. Paradoxically, for all the emphasis on scientific method, collaboration remained for Chermayeff an inexplicable, ethereal space in which "ideal speech," following Habermas, and open exchange mystically occurred and from which collective effort emerged. Marshall McLuhan shared with Chermayeff that the only "workable" structures of engagement abandoned hierarchical models in favor of "small team patterns . . . habituated to crossing functional boundaries." [550] Chermayeff aspired for architects to acquire such boundary-crossing collaborative skills in school -- he claimed that genius "can never be taught, but I think our schools can train the useful collaborator very well" -- yet unlike Wachsmann, made no effort to explore how collaboration worked across functional boundaries -- its "unknowability and unpredictability." [551] He nonetheless saw collaboration as embodying attributes critical to maneuvering architects into a carefully delineated circle of scientific and technical professions.[552]

What was problematic for Chermayeff, however, was that the architectural profession continued to value "the individual, special, expressive and localized, exclusively" while scientific and technological advancements thrived on operating models characterized by the "collective,

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[549] Reinhold Martin calls attention to the underlying communicative transparency of Norbert Wiener's program for the atomic age, a decentralized society interconnected with redundant transport and communication systems intended to withstand nuclear attack and the "specialized, incommunicative discursive environment that created it." Martin notes that in "December 1945, a number of atomic scientists involved in the Manhattan Project launched the Bulletin of the Atomic Scientists, intended to raise public and scientific awareness of the dangers of atomic energy; its sponsors included Albert Einstein, J. Robert Oppenheimer, and Edward Teller (Reinhold Martin, *Organizational Complex: Architecture, Media, and Corporate Space*, Cambridge: The MIT Press, 34 and 37).

[550] Marshall McLuhan correspondence to Chermayeff dated 19 December 1960, Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 7: McLuhan.

[551] Serge Chermayeff, "Corrected Transcript of Professor Chermayeff's Remarks," The Gropius Symposium at The Institute of Contemporary Art, Boston, MA, Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 21, Presentations, 1952, 2. In his review of Turning Point of Building, Chermayeff was critical of Wachsmann's selective historical survey of structural advancements and the absence of any "new structural systems of principles" in the documentation of Wachsmann's exploratory projects with students (Serge Chermayeff, "The Hub of the Matter," *Progressive Architecture* (May 1962), 196, 202, 208, and 212. In discussing the challenges of sustainable natural resource management, Hollings refers to the "unknowability and unpredictability" of ecosystems and their interface with society. I use it here to suggest a similar "unknowability" of collaboration despite extensive effort in the sciences and literary studies to uncover its mysteries (C. S. Holling, "Investing in Research for Sustainability," *Ecological Applications* (1993), 554).

[552] Ibid.

typical, anonymous, universal in character and function."[553] Indeed, leading history of science researchers Beaver and Rosen demonstrate in their seminal study that since the seventeenth century there has been a protracted process in the sciences of shedding the image of the solitary genius.[554] This transition from individual effort to the collective correlated directly to an increasing complexity of scientific investigation and a reliance upon multiple perspectives to support credible conclusions. In the Second World War, this interdisciplinary paradigm was exemplified by the "requisite blurring of boundaries between the military, the corporations, and the university" within the Manhattan Project.[555] Roosevelt himself acknowledged the collective effort as "a unique experiment of team-work and cooperation in coordinating scientific research and in applying existing scientific knowledge to the solution of the technical problems."[556] As Reinhold Martin notes, as the focus of such scientific research transitioned from potent weapons to end one war to strategic programs intended to deter the next, interdisciplinary work relied upon on "complex organizational systems to manage and distribute information . . . made possible by the same scientists whose interdisciplinary efforts grew out of the dream of an organic unity of science based on communication and teamwork between specialists."[557]

Architectural Identity and Research

It was clear to Chermayeff that architects could not achieve such an organic unity of effort without the "latest scientific and technological information on contemporary pressures being exerted upon both the man-made environment and man's historic and natural resources."[558] Yet, as he noted, architects "are by tradition and training, collectively uninterested in research and unsuited to the new task" and he looked to academia as a catalyst for change.[559] "It is clearly the responsibility of universities," he declared, "to produce a new variety of professional excellence in a broader spectrum of environmental studies and a greater understanding generally of the complexity of human ecology in a man-made environment."[560] Should the anachronistic "pre-industrial" practices and image of the architect be obstacles to achieving this objective, he called for suspending the term 'architecture' if it would clarity the proper societal role for the profession.

> Perhaps we need another word to define our activity and until we restore the word architecture to its original meaning and dignity. Perhaps we are scientific humanists

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[553] Serge Chermayeff, "Too Bad If You Missed It," *The Boston Society of Architects: A Record of the Activities of the Society*, vol. 37, no. 4 (November 1951), 1.

[554] D. deB. Beaver and R. Rosen, "Studies in Scientific Collaboration, Part 1: The Professional Origins of Scientific Co-Authorship," *Scientometerics*, vol. 1 (1978), 65-84).

[555] Martin, 185.

[556] Franklin Delano Roosevelt correspondence to Vannevar Bush dated 17 November 1944 as cited in Vannevar Bush, "Science: The Endless Frontier," Washington, D.C.: United States Government Printing Office (1945). Bush recalled many years later that he doubted such collaboration could have been achieved had it not been for the immediacy of war (Vannevar Bush, "Professional Collaboration," *Science*, vol. 125, issue 3237 (1957), 49-54).

[557] Martin, 185.

[558] Chermayeff, "Design as Catalyst," 67.

[559] Ibid.; and Serge Chermayeff, "The Shape of Quality," *Architecture Plus*, published by the students of the Division of Architecture, A&M College of Texas (1959-60), 3. Also, partially re-printed in Plunz, 173; and Chermayeff, "Crisis in Architecture," *Design and the Public Good,* 128.

[560] Chermayeff, "Design as Catalyst," 66.

concerned with a new kind of tool making and for a new set of purposes and conditions. Certainly by doing so we would share in the position of integrity, humility, intelligence, and achievement which distinguish the scientists and humanists of our time." [561]

With this in mind, Chermayeff continued to refine a pedagogy in the 1950s and 60s grounded in research and collective action, first at Harvard (1953-1962) following the contentious absorption of ID into the Illinois Institute of Technology under Mies van der Rohe, and then at Yale (1962-69).[562] For Harvard, he crafted a first-year course comprised of students and instructors from the departments of architecture, landscape architecture, and planning to emphasize the interrelatedness of disciplines "as part of the human habitat in the totality of environmental design." [563] This mirrored other curricular changes underway at the time under the new dean, José Luis Sert, in which "team-teaching," as Anthony Alofsin notes, became the standard instructional strategy.[564] Chermayeff also pursued a bipartite design research program at Harvard focused on "equipping the student with the tools of the designer" and developing an "intelligent approach to functional problems." [565] A wide array of topics captured Chermayeff's imagination, including the "nature of visual perceptions and significance of motion, color and form; direct and indirect consequences of illumination, climate and sound, both physical and psychological; and inter-relationship of posture, movement, fatigue." [566] His proposal for "research through design" on "problems which bring together . . . humanists, artists, scientists and technicians" conveys a conviction that opportunities for architectural investigation were as varied and rich as in the natural and social sciences.[567] Later, at Yale, he proposed an Advanced

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[561] Serge Chermayeff, "The Profession of Architecture," (1950), *Design and the Public Good,* 156.

[562] Tensions prompted by differing positions on pedagogy and the autonomy of architecture contributed to Chermayeff's departure (Powers, 183). Chermayeff's pedagogical efforts also met with some resistance at Harvard, where Sert dampened efforts to incorporate research into the architectural curriculum. He left Harvard in 1962 (Powers, 193). Chermayeff did, however, find success at the Center for Urban Studies sponsored jointly by MIT and Harvard under the guidance of Martin Myerson. His work there became the basis of Community and Privacy co-authored with Christopher Alexander, "a convincing demonstration," according to Powers, "that in architecture at least, art and science could each contribute towards a common social purpose. It reflected new ideas about science as a study of the nature of connections between things, such as the principles of Cybernetics promoted by Norbert Wiener in his book of that name in 1948 and featured prominently in *Shape of Community*" (Powers, 194). Chermayeff taught full-time at Yale from 1962 to 1969, subsequently as professor emeritus, followed thereafter by part-time lecturing at various colleges including Harvard (Powers, 206 and 209).

[563] Powers, 190; Chermayeff, "Memo to Dean Jose L. Sert from S. Chermayeff," undated, Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 34: Administration Harvard, 1955, 2; and "Description of Courses, Curriculum in Architecture, Landscape Architecture, and City and Regional Planning" dated September and October 1953, Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 34: Administration Harvard, 1953. Chermayeff acknowledged that this was in sharp contrast with traditional undergraduate programs at Harvard where Beaux-Arts influenced "drawing and painting" courses "tend to degenerate into crap courses at the beginner level where bored instructors watch students being artistic" (Chermayeff, "Memo to Dean Jose L. Sert from S. Chermayeff," undated).

[564] Other faculty in the environmental design course included Reginald Isaacs, Hideo Sasaki, Paul Norton, Jacqueline Tyrwhitt, and Albert Szabo. (Alofsin, 253-255).

[565] Chermayeff, "Memo to Dean Jose L. Sert from S. Chermayeff," undated).

[566] Serge Chermayeff, "Too Bad If You Missed It," *The Boston Society of Architects: A Record of the Activities of the Society*, vol. 37, no. 4 (November 1951), 2.

[567] Serge Chermayeff, "Docket for the Faculty Meeting in the last week of April," Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 6 (55-59), as cited in Dean Hawkes, The Shaping of Architectural Research," *ARQ*, vol. 5, no. 3 (2001), 206.

Studies Fellowship Program to facilitate the study of "long term ideas and principles" pertinent to architectural design, and structured a Master Class on urban design premised on collaboration amongst students, faculty, and outside specialists.[568]

Chermayeff's objective through these undertakings was not merely to transform the identity of the architect into that of a technician. Rather, through "continuous and essential research" as was "commonplace in all the critical situations in civilized societies," he sought to prepare architects for close collaboration with scientists, to evolve as

> well integrated functionaries in the field as a whole . . . within which social purpose, technical means and pleasure content are organic parts or, in other words, an activity which will embrace and correlate into a single field of activity the work of artist-scientist-technician.[569]

His efforts to infuse scientific methodologies into architectural training and practice were not without precedent, as exemplified by the seminal nineteenth-century theorizations of Henri Labrouste (1801-1875) and Gottfried Semper (1803-1879). At the onset of the twentieth century, architects McKim, Mead & White, renowned for their architectural historicism, teamed up with Wallace Sabine, a Harvard physics professor, to apply a novel sound reverberation formula to the interior design of Boston Symphony Hall.[570] In the 1920s, Hannes Meyer of the German Bauhaus promoted the "scientization" of architecture, premised on the distilling of buildings to their essential functional and relational elements.[571] In this same period, the exploratory work of Buckminster Fuller -- he was briefly a colleague of Chermayeff's at ID in 1949 -- pointed the way to a "design science" with the dual objectives of optimizing human habitation while minimizing energy and resource use in its fabrication.[572] After the Second World War, there was broad academic interest -- exemplified by the design methods movement -- in rationalized methodologies inspired by wartime operations research and, more specifically, the general systems theories of Ludwig von Bertalanffy.

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[568] Powers, 210; and Hawkes, 207. Powers observes that at Yale, "Chermayeff reached the final stage of his work towards a curriculum in 'Environmental Design,' with the kind of freedom he had hoped for when first outlining curricular schemes in the 1940s. . . From his 'Master' classes, Chermayeff developed what he termed the 'Yale' model, a form of collaborative work between resident faculty, visiting experts, and the students themselves, examining existing urban schemes or proposals" (Powers, 210).

[569] Serge Chermayeff, "Designer's Dilemma," (1962), *Design and the Public Good*, 183; Chermayeff, "Too Bad If You Missed It," 2; and Chermayeff, "Architecture at the Chicago Institute of Design," *Design and the Public Good*, 256-257. This not incidentally corresponded with the perspective of Buckminster Fuller -- who taught at ID in 1949 while Chermayeff was director -- who sought to produce students with the capacity for "thinking and designing comprehensively, an emerging synthesis of artists, inventor, mechanic, objective economist and evolutionary strategist" (Buckminster Fuller, as quoted by Chermayeff, "Architecture at the Chicago Institute of Design," *Design and the Public Good*, 253).

[570] Emily Thompson, "Listening to/for Modernity: Architectural Acoustics and the Development of Modern Spaces in America" in Peter Galison and Emily Thompson, eds., *The Architecture of Science* (Cambridge, MA and London: The MIT Press, 1999), 258-261.

[571] K. Michael Hay, "Diagramming the New World, or Hannes Meyer's 'Scientization' of Architecture," in Galison and Thompson, *The Architecture of Science*, 233-252.

[572] Fuller's own pedagogical objective, as Chermayeff described it, was to produce students capable of "thinking and designing comprehensively, an emerging synthesis of artists, inventor, mechanic, objective economist and evolutionary strategist." Fuller, as quoted by Chermayeff, "Architecture at the Chicago Institute of Design" (1950), Design and the Public Good, 253.

Notwithstanding the intrinsically collective character of these seminal activities, the re-formulation of architecture along scientific principles did not ensure concordance with Chermayeff's own position on collaboration. In the case of the design methods movement, which was contemporaneous with Chermayeff's tenure at Harvard and Yale, there arose an iteration of collaboration that was far more inclusive than he had imagined. The movement sprouted from a series of academic gatherings in the United States and England, initially with the Conference on Design Methods organized in 1962 by J. Christopher Jones and D. G. Thornley, followed by conferences at the University of Central England at Birmingham in 1965, at the short-lived but influential *Hochschule fur Gestaltung* in Ulm in 1966, and then again the following year in Portsmouth.[573] American activities included formation of the Design Methods Group at Berkeley in 1967, the DMG newsletter edited by Gary Moore with contributions by Jones, Christopher Alexander, Horst Rittel and others, and an international conference at MIT in 1968.[574] As Jones observes, the movement did not in actuality constitute a singular, cohesive position on design methodologies. Rather, it was an array of science-based strategies to improve the efficiency and outcome of architectural production, from Herbert Simon's General Problem Solver to L. Bruce Archer's advocacy of design as a linear process.[575]

Chermayeff's principal connection to the design methods movement was through Alexander, his doctoral student at Harvard while Alexander crafted what was to become *Notes on the Synthesis of Form*, and later his "collaborator" on *Community and Privacy*, a quest for a rationalized "pattern language" leading to humanistic architecture.[576] In his early work, Alexander viewed design as a process of decomposition, distilling larger design problems to their constituent parts and groupings intended to facilitate a mapping of the ideal solution. Chermayeff generally concurred with the rationalized processes underlying such methods, contending, for instance, that the path from programmatic needs to suitable solution requires "a logical system of thought rather than upon emotion." [577] Wary, however, that the importance of creativity to architectural production might be overlooked, he cautioned that the design process "requires qualities in man of not only just collaborating, but also the capacity and intensity to find in creative imagination the answers or discontent." [578] More problematic for Chermayeff was that intrinsic to these new design methodologies was a view of collaboration as a means of knowledge exchange that not only affirmed but enabled the very design specializations he sought

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[573] For surveys of the design methods movement, see Nigel Cross, "Science and Design Methodology: A Review," *Research in Engineering Design*, vol. 5 (1993), 63-69; Nigel Cross, "Designerly Ways of Knowing: Design Discipline Versus Design Science," *Design Issues*, vol. 17, no. 3 (Summer 2001), 49-55; and Nigan Bayazit, "Investigating Design: A Review of Forty Years of Design Research," *Design Issues*, vol. 20, no. 1 (Winter 2004), 16-29. At various times in its twelve-year existence, L. Bruce Archer, Wachsmann, Buckminster Fuller, and Mies van der Rohe all taught at Ulm.

[574] Bayazit, 19-20.

[575] J. Christopher Jones, "A Method of Systematic Design," in J. Christopher Jones and D. G. Thornley, eds., *Conference on Systematic and Intuitive Methods in Engineering, Industrial Design, Architecture and Communications* (Oxford and New York: MacMillan, 1963), 53.

[576] Serge Chermayeff correspondence to Charles W. Moore dated 11 March 1963 recommending Christopher Alexander for an assistant professorship at the College of Environmental Design at Berkeley based on his "penetrating analytical mind and mathematical excellence," Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 4: Christopher Alexander.

[577] Chermayeff, "The Shape of Quality," 3.

[578] Serge Chermayeff, "Corrected Transcript of Professor Chermayeff's Remarks," 2.

to eliminate under the umbrella of environmental design. Moreover, following Rittel, with subsequent recognition of the inadequacies of "first generation" scientific, expert-based design methodologies -- Alexander and Jones both veered away from the "behaviourist" efforts of design methods to "fix the whole of life into a logical framework"-- there arose a more participatory "second generation" of design methodologies to contend with the uniqueness of "wicked" problems.[579] It is in this second-generation methods, amidst broad and often volatile societal action against established traditional institutions and the professions for perceived failures to resolve socio-economic inequities, that we see a professional/client asymmetry in problem-solving give way to a "symmetry of ignorance" and the legitimization of users in an inclusive iteration of collaboration assigning equal value to all participants.[580] As Jones describes it, this new interpretation of collaboration gave primacy to "the sharing of responsibilities between users and experts, and to designing imaginatively in a collective process."[581] Notwithstanding Chermayeff's interest in a human- and user-oriented environment, this externalizing of design through a broadly participatory process extended the meaning of collaboration far beyond the exclusive realm of credentialed architect-designers, scientists, and technicians he had envisioned.

The AIA similarly adopted a stance on collaboration more inclusive than that of Chermayeff in Turpin Bannister's mid-century report on the profession, which highlights the "paramount importance" of promoting a policy of research amongst architects.[582] While acknowledging a pervasive concern amongst practitioners that "criteria born of logic might become an intolerable straightjacket to inspiration," the Bannister report asserts that "modern" knowledge production flows from the "scientific method in well-planned programs of research." The architect's obligation in research, according to Walter Taylor, the AIA research director, is to "bridge the gap between the social and physical sciences," yet the absence of a research mentality in the profession had contributed to its failure to keep pace with scientific and technological advancements in other fields.[583] As Taylor noted, the construction industry had historically

> accommodated within itself . . . modern science and technology, but it has been a grafting and remodeling operation. In contrast, the automotive and electronic industries were

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[579] J. Christopher Jones, "How My Thoughts About Design Methods Have Changed During the Years," *Design Methods and Theories*, vol. 11, no. 1 (1977), 48-62; and Rittel, "Dilemmas in a General Theory of Planning," 160-167.

[580] Rittel, "Second-Generation Design Method," in Cross, ed., *Developments in Design Methodology,*, 317-327. In his discussions of post-war collective action methodologies, Rittel opted to use the word "co-operative" rather than collaborative (Horst Rittel, "Hierarchy or Team? Considerations on the Organization of R&D Cooperatives" in R. A. Tybout, ed., *Economics of Research and Development* (Columbus: Ohio State University Press, 1965), 174-218.

[581] C. Thomas Mitchell, *Re-defining Designing: From Form to Experience* (New York: John Wiley & Sons, Inc, 1992), 44.

[582] Turpin C. Bannister, ed., *The Architect at Mid-Century: Evolution and Achievement* (New York: Reinhold Publishing, 1954), 408 and 414. Chermayeff nonetheless resigned from the AIA the same year Bannister's report was published, according to Powers, "partly in protest against its lack of commitment and initiative in the field of architectural research, its neglect of housing, and as a stand against the increasing formalism in American modern architecture, represented by the changing direction in the work of architects he new personally, such as Philip Johnson and Edward Durrell Stone" (Powers, 207-208).

[583] Walter A. Taylor, Director of Education and Research of the AIA, as cited in Bannister, 411.

> born full-fledged out of the age of science and the industrial revolution, and have normally and naturally based their evolution on research.[584]

Of interest here is that the Bannister report acknowledges the collective aspect of research.

> It is true that the scope of architecture is so broad, it touches almost every field of knowledge, and architects themselves cannot expect to conduct investigations in each of these fields on a professional level. By the same token, experts in these fields can seldom translate their findings into architectural terms. The solution of this impasse is not to forego such assistance, but by joint action endeavor to bridge the gap.[585]

Bridging the "gap" in this context meant collaboration, defined simplistically as "complete cooperation, sympathy, and understanding on the part of all concerned."[586] As with Chermayeff, the Bannister report acknowledges the divisive effect of specialization, but adopts a position more closely aligned with the design methods movement by conceding the inevitability of disciplinary boundaries. While admittedly an elusive goal in a post-war economy in which consultants were increasing geographically-dispersed, collaboration was held out as a means of harnessing diverse talents across accepted disciplinary boundaries motivated by a "thoroughly integrated building."[587] This was a responsibility, Bannister noted, that ultimately rested -- following Gropius rather than Chermayeff -- upon the architect's shoulders.

Notwithstanding distinctions regarding the composition of collaboration, these various interpretations shared with the Chermayeff iteration an exclusionary aspect that relegated engineers to a secondary role. This is worth exploring at some length here for it carries forward the very same marginalization of engineers present in the La Farge and Lescaze iterations of collaboration discussed in previous chapters, an exclusionary character that contributed to the undermining of their transformative aspirations. Chermayeff, for one, had no doubt that engineers played an important role in the built environment but, as specialists, they were not in his mind the architect's equal.[588] This exclusionary aspect -- the engineer was neither collaborator nor invited to join under the broad umbrella of environmental design -- differed from the vision laid out by Gropius. When *Architectural Forum* praised Gropius as a "servant of the collective effort," his teamwork-collaboration allowed for the participation of "engineers, manufacturers, contractors."[589] In his later reflective years Chermayeff spoke fondly of his experiences with engineers in the 1920s and 30s -- Owen Williams, Ove Arup, and Felix Samuely to name a few -- and praised the architect-engineer "masters of our time" -- Pier Luigi Nervi, Felix Candela, and Frei Otto -- whose contributions to "great form-making" might serve as the foundation for an architecture of "noble purpose."[590] Yet he repeatedly belittled engineers

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[584] Ibid.

[585] Ibid., 409-412.

[586] Ibid., 38.

[587] Ibid.

[588] Chermayeff, "Crisis in Architecture," *Design and the Public Good,* 131.

[589] Anthony Alofsin, *Struggle for Modernism: Architecture, Landscape Architecture, and City Planning at Harvard*, W. W. Norton Company, (2002), 232.

[590] Chermayeff, "Thinking about the Thirties," *Design and the Public Good,* 215; and Chermayeff, "Shape of Quality," *Design and the Public Good,* 175.

while concurrently envying their success at nurturing the sort of empirically-based practice he desired for architects. In 1939, Chermayeff cautioned students at the Architectural Association that they might "eke out a living propping up basements for some years; but that, if it is a job at all, is a job for engineers." [591] In his later ARP proposals, Chermayeff barely mentioned engineers, choosing instead to emphasize roles for the architect and planner.[592] While at ID, he cautioned that if architects did not recognize and act upon their societal responsibilities, then others -- namely engineers, who "merely provide a technical solution" -- would supplant them in competition for dominance in the built environment.[593]

Chermayeff speaks here of competitive tensions that first emerged in the late nineteenth century as engineers moved from institutional settings to a diversity of specialized private practices and, in doing so, positioned themselves paradoxically as both essential to and competition for architects in a construction industry made more complex by advanced building technologies. Historian Peter Collins, who attended the 1964 AIA-ACSA teaching seminar at Cranbrook with Chermayeff, observed that with the abandonment of ornament by mid-twentieth century and modernist attention to "structural virtuosity," the line between architecture and engineering had become increasingly blurred. "Thus the engineer is now required not so much to calculate the inner skeleton of a design . . . but to evolve with the architect the very character of the composition itself." [594] Yet achieving such intimate architect/engineer cooperation or collaboration -- Collins used these terms without differentiation -- was challenging given an architectural pedagogy that remained trapped in the heroic architect-artist mentality. This made it difficult for architects to accept the engineer as collaborator in the workplace, where the engineer was just as likely to be a competitor for certain building typologies. This suggests that when Chermayeff relegates the engineer to a supporting yet critical role in practice, it was not only an instinctive re-enactment of the enculturating experience of the academic studio, it was a pragmatic response to a perceived jurisdictional threat -- real or otherwise -- from a worthy competitor. In this regard, such exclusionary collaboration evidences the tensions inherent in Abbott's theorized system of professions, in which the fluidity of jurisdictional boundaries contributes to disciplinary competition.

Mainstream professional journals in 1950s and early 1960s -- most notably *Architectural Record*, *Progressive Architecture*, and *Architectural Forum* -- echoed Chermayeff's exclusionary iteration by publishing articles in which collaboration occurs principally amongst architects and other design disciplines. In rare instances when mention is made of engineers, there is little effort to examine the actual nature of the working relationship; the term collaboration being employed merely as a general term of convenience. When *Progressive Architecture* suggested in 1959, for instance, that Guy B. Panero Engineers and structural engineer Paul Weidlinger had "collaborated" with architects Hood & Manice on a vast subterranean shelter for four million residents carved deep into the bedrock beneath Manhattan, the editors offered no insight into how the design actually unfolded amongst the participants.[595]

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[591] Serge Chermayeff, "Training for What?" *Design and the Public Good,* 235.

[592] Chermayeff, "ARP and our Office of Civilian Defense," 591.

[593] Chermayeff, "Crisis in Architecture," *Design and the Public Good,* 131-132.

[594] Whiffen, 1964 AIA-ACSA Teacher Seminar, The Journal of the AIA, 1964; and Peter Collins, "Tectonics," *JAE*, vol. 15, no. 1 (Spring 1960), 31.

[595] "Architects, Engineers Collaborate on Civil Defense Plan," *Progressive Architecture*, vol. 40, no. 3 (March 1959), 149.

The AIA further institutionalized this exclusionary character through its own journal, which tended in the 1950s to address collaboration as though it were exclusively -- in opposition with Chermayeff but aligned with La Farge -- an enterprise involving architects and artists.[596] In one such article, Gilmore Clarke acknowledges the importance of collaboration in an economy characterized by diversity and specialization -- even more so "when the democratic peoples of the world . . . resolutely fac[e] the menace of Communism" -- yet in defining collaboration as "the cooperative efforts so desirable for creating effective results in the solution of more or less complex problems," Clarke excludes engineering from a circle of arts enveloping architecture, landscape architecture, painting, and sculpture.[597] Moreover, he remarks that while engineers contribute to "man's efforts to change the surface of the earth," the outcome of these efforts lack aesthetic attribute without participation by "at least one of the professions of arts."[598]

This is not to suggest there was complete disregard for the architect/engineer relationship. There were a number of efforts to promote architect/engineer cooperation after the Second World War, exemplified by a "plan-now-for-V-Day" promotion in *Architectural Record*.[599] Bannister's own mid-century state of the profession report to the AIA duly noted the "rapidly expanding elaboration of engineering installations in buildings and a growing appreciation of the necessity of intimate cooperation." The report further suggests relations between architects and engineers might be enhanced with joint conferences of "architecturally-minded engineers and architects with special engineering interests." Bannister went so far as to propose a radical idea for the time: special membership status in the AIA for "engineers primarily concerned with building problems."[600] Symbolically, however, cooperation fell short of collaboration. Much as Chermayeff insisted on the synthesized architect/designer collaborating as an equal with the scientist, so too did engineers resist any suggestion they were anything less than a legitimate peer of the architect. Mario Salvadori, a prolific author on engineering, resisted such linguistic gamesmanship, arguing vehemently for collaboration to be accepted as "the basis of work between the architect and the engineer."[601] The engineer, Salvadori continued, "will be elated to

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[596] See, for instance, J. Byers Hays, "Collaboration: Architect and Sculptor," *AIA Journal*, vol. 17 (January 1952), 19-25; John Gregory, "Collaboration of Sculptor and Architect," *AIA Journal*, vol. 23 (December 1955), 261; John Stewart Detlie "Community Collaboration in the Fine Arts -- Part I," *AIA Journal*, vol. 26 (October 1956), 139-144; and John Stewart Detlie "Community Collaboration in the Fine Arts -- Part II," *AIA Journal*, vol. 26 (November 1956), 209-211.

[597] Gilmore D. Clarke, "Collaboration in the Arts of Design," *AIA Journal*, vol. 16 (July 1951), 9. It should be noted that Clarke acknowledged several decades earlier the value of architect/engineer collaboration in bridge design and construction (Gilmore D. Clarke, "Collaboration in Bridge Designing. Part 1: The Architect," *The Architectural Forum*, vol. 48, no. 5 (May 1928), 729-734.

[598] Clarke, "Collaboration in the Arts of Design," 9-10.

[599] *Architectural Record*, vol. 95 (Jan/June 1944), 50-51.

[600] Turpin C. Bannister, ed., *The Architect at Mid-Century,* New York: Reinhold Publishing (1954), 64, note 11. While the AIA was hesitant to use the term collaboration in reference to the architect/engineer relationship, earlier that decade it jointly sponsored a program with the National Association of Home Builders to promote "better architect-builder collaboration" intended to demonstrate to the homebuilder industry the value-added proposition of engaging architects on their projects. The following year, the NAHB sponsored a house design competition for architects, reported to be an "important milestone along the road to widespread architect-builder collaboration and better house design for the average American family." ("Architect and Builder," *Architectural Forum*, vol. 93, no. 3, (September 1950), 114; and "House Design Competition," *Architectural Forum*, vol. 94, no. 3 (March 1951), 103 and 104-107, 196).

[601] Mario G. Salvadori, "The Engineer and the Artist," *Perspecta*, vol. 5 (1959), 17.

be at long last a collaborator, instead of the mere serf of the architect. . . We don't have the architecture we deserve because we haven't learned to collaborate." [602]

Chapter Conclusion

As Chermayeff concluded his academic career in the late 1960s, it was clear that some of his deepest concerns about the architectural had come to fruition. Amidst public animosity for a modernist project that turned away from early social imperatives in favor of corporate interests and form-making, architects failed to become intimately linked in the public's mind with societal good or to garner the epistemic authority Chermayeff coveted. Individualism manifested in an emerging star architecture and unmitigated tendencies toward specialization and division of labor all conspired against realization of a unified field of environmental design operating in collaboration with the sciences.[603]

Moreover, Chermayeff's iteration of collaboration as a carefully delineated and lofty circle of architect-designers, scientists, and technicians working in a commonality of scientific method and purpose remained largely confined to the academic arena. Operating in a somewhat separate universe on the other side of an academic/practice divide, architects attended to more pragmatic matters of economic survival. The public outcry for more responsiveness to societal exigencies was contemporaneous with other pressures from the corporate sector, which now demanded "broader and more complete services for buildings." [604] No longer satisfied with the intrinsic risk of specialized consultant teams led by architects employing design-bid-build project delivery methodologies, corporate clients increasingly resorted to single-source providers who creatively responded to market demand by assembling design, engineering, and construction services under one roof.

This "packaging" of services -- owing more to economic pragmatism than to grand schemes of integration -- was not the collaboration Chermayeff had envisioned. He had consistently insisted that "the whole point" as it pertained to the design disciplines was not collaboration as such but the integration of the disciplines into a unified field of action.[605] Despite his protestations, however, there is some indication that Chermayeff may have accepted, albeit reluctantly, the inevitability of specialization. Speaking at the Institute of Contemporary Art in Boston in 1952, he acknowledged the robust tendencies toward "developing a building industry in terms which require the collaboration of many different experts." While the experts in this context were the multiple design disciplines he sought to eliminate, he begrudged the potential of this iteration of collaboration to mitigate the negative effects of individualism. "This type of collaboration," he noted, "means that gradually we are the restricting the individual's responsibility, so that whoever are the participating parties in this collective can afford to indulge themselves less and less." [606]

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[602] Ibid.

[603] Aggravated that architects had failed to earn a pivotal role mediating between societal and environmental exigencies, Chermayeff himself fantasized that the 'shape-makers' of the profession might "like old soldiers or the Cheshire cat, fade away along with their creations" (Chermayeff, "Institutions, priorities, and revolutions," 23.

[604] Dudley Hint, "The New Role of the Architect," in "A Second Report on Your Profession," *AIA Journal* (April 1962), 80.

[605] Chermayeff, "Symposium on the Integration of the Arts," 2.

[606] Chermayeff, "Corrected Transcript of Professor Chermayeff's Remarks," 2.

Chermayeff nonetheless saw specialization as not only problematic for collective action but also undermining the very essence of a profession. To his way of thinking, professions possess a body of knowledge, language, and skill set enabling its members to serve society ostensibly out of selfless interest, an "asymmetry" of knowledge underlying the "traditional contract between the autonomous professional expert and his client."[607] The seemingly infinite languages of specialization served to aggravate a widening chasm between professions and society, thereby precluding the possibility of aligning professional intent with societal good. Further complicating matters was the transformation under industrialization of the prevailing patron type from individual to group -- Giedion's "hydra with a thousand heads."[608] Long accustomed to satisfying the needs and dictates of individual patrons, architects now faced an ever-increasing force of institutional committees and community user groups having input on and bearing responsibility -- but not necessarily the will or cohesiveness -- for decision-making. This transformation placed new demands on the profession, straining the ability of specialists to respond effectively as individuals to new communal demands.

In the 1960s, psychologist and design methods proponent B. N. Lewis observed that it had long since become standard practice to entrust complex problem-solving to interdisciplinary groups on the premise that critical knowledge and experience resided more so with the group and its collective effort than with individuals. Yet, he noted, varying disciplinary languages, methodologies, and objectives frequently militated against successful outcomes from such "mutual interactions."[609] Indeed, characteristic of professions under technical rationality is the articulation of specialized bodies of knowledge and language to differentiate one profession from another. This suggests that any bridging of disciplinary differences requires some commonality of expression, or as Habermas highlights in his theory of communicative action, an "ideal speech situation."[610] This ideal is elusive, and the pathway fraught with seemingly endless objective, organizational, methodological, linguistic, and personal conflicts. In discussing the pioneering information theories of Shannon and Weaver, Richard Coyne notes that when individuals communicate with each other, messages embedded in that communication are

> bound to be modified as the vagaries of interpretation are compounded. . . The individual represents the site of authenticity, where meanings are whole, and from whom meanings make occasional excursion into the realm of the group, through the individuation of words. Communication between individuals must pass through this perilous territory of multiplicity and ambiguity.[611]

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[607] Schön, 339; and Rittel, "Second-Generation Design Methods," in Cross, ed., *Developments in Design Methodology*, 317-327. Rittel used the phrase "symmetry of ignorance."

[608] Chermayeff, "Crisis in Architecture," *Design and the Public Good*, 129; and Siegfried Giedion, transcript of remarks from "Symposium on the Integration of the Arts," 8 February 1954, Serge Ivan Chermayeff Architectural Records and Papers, 1909-1980, Avery Library, Box 36: Writings and Presentations, Harvard 1955,16.

[609] B. N. Lewis, "Communication in Problem-solving Groups," in J. Christopher Jones and D. G. Thornley, eds., *Conference on Systematic and Intuitive Methods in Engineering, Industrial Design, Architecture and Communications*, Oxford and New York: MacMillan (1963), 169.

[610] Jurgen Habermas, *Theory of Communication Action, vol. 1: Reason and the Rationalization of Society*, tr. Thomas McCarthy (Boston: Beacon Press Books, 1984), as discussed in Lawrence Soley and Sarah Bonewits Feldner, "Transparency in Communication," *Journal of Communication Inquiry*, vol. 30, no. 209 (2006), 209-228.

[611] Coyne, 270.

If such an interpretation is correct, then Taylorist specialization -- and with it specialized language -- would, as Chermayeff suggests, add to that confusion and render the transference of meaning that much more difficult. Indeed, Lefebvre, who Coyne also cites, observes that the "major culprits" in the breakdown in societal communication are professional specializations that

> divide space among them and act upon its truncated parts, setting up mental barriers and practico-social frontiers. Thus architects are assigned architectural space as their (private) property, economists come into possession of economic space, geographers get their own 'place in the sun,' and so on.[612]

It was in response to these multitude of "spaces" that Chermayeff championed a re-integration of design professions long separated in practice and academia, a language of scientific research and process over typology of form, and the collective over the individual. In doing so, he sought not only to bring scientific rigor to bear on how architects mediated environmental and societal exigencies, he sought to extract the profession from its "pre-industrial" ways and to capture the legitimizing epistemic authority and credibility freely awarded to the sciences and science-like professions.[613] Notwithstanding the broad interest in interdisciplinary effort rooted in the techno-military accomplishments of the Second World War, Chermayeff's vision to erase established disciplinary boundaries in favor of a unified field of action ultimately ran aground in the face of politico-economic realities, issues of professional identity and authority, and the delineation of disciplines to be granted access to such a field of action. From this perspective, the collaborative divide remained intact and Chermayeff's idealization of collective action proved to be as elusive and no more realizable than La Farge, Lescaze, and Kohn before him.

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[612] Henri Lefebvre, *The Production of Space,* tr. Donald Nicholson-Smith (New York: John Wiley & Sons, 1992), 89, as cited in Coyne, 139.

[613] Gieryn, 1.

CONCLUSION

I have examined in this dissertation a number of protagonists who, at various moments in the twentieth century, held out collaboration as an ultimate expression of the collective transformative ideal. In each instance, their idealization of collaboration operated at the boundaries of the profession, the edges where architects affirm the collective nature of architecture by engaging with others in the conception and production of buildings. In this concluding chapter, I consider the principal insights drawn from these case studies, and the relevance to and implications for the architectural profession. In doing so, I advance the discussion to the present, and consideration of a twenty-first century societal discourse that once again seizes upon collaboration as an idealized signifier of collective action, in this instance, one characterized by a connectivity empowered by information and communication technologies.

Principal Insights and Contribution

The initial premises of this dissertation were: first, that architects have long embraced collective action as a transformative mechanism motivated by diverse societal, environmental, stylistic, and professional outcomes; secondly, that of a litany of signifiers for collective action -- cooperation, teamwork, coordination, etc. -- collaboration has been the most problematic, measured not by the semantic confusion enveloping it but by a sustained and expansive divide between its idealization and realization; and, thirdly, that this collaborative divide serves metaphorically not only to depict an idealization/realization gap, but also to characterize the assertion rather than easing of disciplinary boundaries embedded in the twentieth-century promotion of collaboration. While the several categories of literature cited in the introductory chapter -- architecture as a profession, collaboration in the literary arts, the professions and disciplinary boundaries -- all touch upon gaps between theory and practice, the principal contribution of this dissertation is a foregrounding of the historical problematics of a collaborative divide specifically as it pertains to architects and their engagements with non-architect 'others.'

What is now evident from this study is that beyond the innumerable procedural challenges of optimizing communication across disciplinary boundaries -- the thrust of scholarship by Gieryn, Star, and Galison, and theorized in Habermas's "ideal speech situation" -- architectural aspirations for collaboration recurrently encounter a paradox that ultimately disrupts and undermines such endeavors. This paradox is that while collaboration may be a persuasive and persistent reminder in the professional consciousness that architecture is not produced in isolation, it is nonetheless oppositional to normative architectural practice in which primacy is granted to the individual over collective identity, authority, and authorship. Compounding this paradox is that in the endless quest for a professional ideal -- that is, a distinct body of architectural knowledge and services, control over the process of architectural production, and principal attribution for the outcome of that process -- architects render difficult the alignment of individual/collective motivation and methods necessary for cohesive collective action. Wary of structural or systemic transformations of practice that might diminish their status in jurisdictional maneuvering -- Abbott's fluidity of the professions -- architects promote collaboration not for the purpose of easing or erasing disciplinary boundaries, but to re-assert or re-draw boundaries in service of architectural identity, authority, and authority. Notwithstanding proclamations of its transformative promise in the collective interest -- architecture as public art, eradication of urban chaos, furtherance of democratic society, etc. -- collaboration instead serves to perpetuate the

status quo -- as with La Farge's historicist agenda of collaboration as a bulwark against modernist intrusions -- and sustain the collaborative divide between idealization and realization, and between architects and non-architect others.

Indeed, as I demonstrate in the first case study, La Farge envisioned collaboration as the ultimate formal expression, the physical integration of architecture and the visual arts framed by an historicist sense of societal harmony and order constructed on an idealization of the Renaissance. The discourse amongst his like-minded colleagues nurtured through exclusive clubbing and shared-interest societies, however, speaks more to a concern for the architect's role as commander-in-chief and author(ity) of the work, and the exclusion of engineers from the lofty collaborative circle signals architects' discomfort with a reliance upon others for technical expertise. This assertive delineation of collaboration around architects and artists of historicist orientation to the exclusion of others suggests a bounded practice disconnected from a post-First World War era in which ethnic, class, and nation-state boundaries disrupted by unrest and the pace of technological advancement were increasingly difficult to discern. In this LaFargian fantasy, architects might rely upon engineers, even covet their "direct, sure, competent, orderly habit of mind" but the erasure or easing of protective boundaries was simply inconceivable.[614] Seen in this light, collaboration promulgated in the interest of the collective good was in reality a defensive barrier intended to protect the identity and authority of the historicist architect against the intrusions of others, modernist or otherwise. That architectural practitioners did not broadly embrace this exclusionary iteration of collaboration evidences not only its elitist character, it demonstrates that socio-economic forces acting upon the profession readily thwart the realization of collaboration as a normative practice.

As I show in the second case study, William Lescaze's societal motivations -- a legacy of early European modernism transplanted to American soil -- were the basis for his public musings on modern architecture seemingly intertwined with and reliant upon a modernist iteration of the collaborative ideal. It was a collaborative ideal that, as is with the La Fargian iteration, found inspiration in the Renaissance, yet in this instance inspired by an idealization of collective architectural production rather than formal/physical attributes. For all of Lescaze's efforts to instill in modernist architectural production a similar collective character, however, his first priority remained promotion of the role and identity of the decidedly modernist architect. That his reputation as a modernist remained untainted despite a discomfort with collaboration in his own work suggests that the legitimization of modernism was dependent neither on the theorization nor practice of collaboration.

This decoupling of modernist architecture and collaboration is further evident in the competing paradigm of collective action exemplified by Robert D. Kohn, who privileged cooperation over collaboration as the ideal basis for human relations in a progressive democratic society. Rooted in the teachings of Felix Adler and the Ethical Society, this was a paradigm of "interrelation and interdependence" encouraging communication and comprehension at and

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[614] As Chloë Houston discusses, the inhabitants "are protective of their borders, which are guarded, and defended with violence if they come under attack. They also operate a system of spying ambassadors, who learn secretly about the world, and help to improve their own culture, whilst not publicising themselves." These same inhabitants, Houston continues, "are kind to visitors, showing them around, and even allowing them to become citizens after a probationary period. But despite this seeming openness to strangers, they are at heart a closed society, and there is a continual emphasis on their difference to their European visitors, and their superiority." (Chloë Houston, "No Place and New Worlds: The Early Modern Utopia and the Concept of the Global Community," *Spaces of Utopia: An Electronic Journal*, no. 1 (Spring 2006), 16).

between all levels of society -- individuals, communities, professions, government -- to counter the societal complexities and urban chaos broadly attributed to the process of industrialization. While demonstrably motivated by the collective interest, Kohn's carefully articulated and widely disseminated program of cooperation encountered no less resistance than that of La Farge and Lescaze, faltering in the vastness of public sector entanglements and in contentious large-scale manifestations with multiple stakeholders plagued by disciplinary, economic, and political differences. For both Kohn and Lescaze, distinct gaps between the idealization and realization of collective action suggest that such theories, regardless of semantic, stylistic, or political persuasion, fail to adequately account for the diverse motivations and competitive tensions intrinsic to their undertaking and ultimate demise.

Finally, Serge Chermayeff's iteration of collaboration as a boundary-erasing, stylistically-neutral process differed radically from the historicist and modernist iterations of La Farge and Lescaze but succumbed nonetheless to the collaborative divide. It was an iteration openly expressive of the new "endless frontier" in the post-Second World War era and a confidence that rationalized methodologies might be applied to societal problems of any type, scale or complexity. It was equally an iteration intent on an epistemic authority to re-cast architects as good stewards of societal exigencies. Yet fundamentally, Chermayeff's attempt to craft a unified field of environmental design modeled on and in collaboration with the sciences was largely an exercise in re-drawing rather than erasing disciplinary boundaries. Unable to overcome the entrenched specialist tendencies of technical rationality, his prognostications bore little practical application and remained largely confined to academia.

Relevance

The insights garnered from these case studies not only calls into question the efficacy of collaboration as a signifier of collective action, they establish an historically-based framework for assessing the twenty-first century re-emergence and idealization of collaboration as a transformative boundary-erasing or easing practice. Along these lines, I begin with two principal aspects to this recurrence. First, the contemporary discourse remains intriguingly disconnected from the past, instead residing within and drawing inspiration from a broader societal discourse that holds collaboration to be an innovative twenty-first century practice. Secondly, underlying both discourses is a faith in the seemingly limitless potential of technological connectivity -- an echo of Vannevar Bush's post-war "endless frontier" from the Chermayeff chapter -- promising fulfillment of the collaborative ideal while simultaneously perpetuating its unknowingness and elusiveness.

To elaborate, collaboration in this broader societal discourse shifts from a bounded social practice -- that is, face-to-face relationships in social clubs and shared-interest associations organized along class and professional lines exemplified by the La Farge case study -- to a practice more often than not mediated by communication and information technologies promising erasure of spatial, temporal, cultural, and disciplinary boundaries. As artist and writer Linda Carroli observes, computer-mediated communications have "come to signify an intimate relationship between the local and global that heralds the dispersal of established cultural institutions and the proliferation of diversity, and it provides a space in which new relations are

both necessary and formative of new social networks."[615] Adapting here Mark Wigley's discussion of total design, collaboration may be seen as undergoing both implosion -- an inward focus to embrace all modes of human interaction -- and an explosion reaching outward to encompass all conceivable modes of connectivity between humans, inanimate objects, and ideas. This connectivity, and the implicit promise of technological achievements yet to unfold, serves as both model and metaphor in the contemporary discourse on collaboration.[616]

Despite nagging uncertainties about the efficacy of technology relative to the multiple objectives of transparency, egalitarian decision-making, and transformative outcome, the technological lure -- Coyne's technoromanticism -- fuels the belief that 'true' collaboration may be at hand, that humans may someday be "cross-linked" and "woven" together much as we aspire for once isolated pixels of data.[617] Indeed, beyond the mere searching of documents and texts, "the real magic" in upcoming technology, as reported in *The New York Times*, will be when "each word in each book is cross-linked, clustered, cited, extracted, indexed, analyzed, annotated, remixed, reassembled and woven deeper into the culture than ever before. In the new world of books, every bit informs another; every page reads all the other pages."[618]

This metaphor of connectivity serves well to clarify recent tendencies in the entertainment and media industries toward recognition of the audience not as mere consumers of visual material but as participants in its creation. Beyond the figurative manifestation of post-structuralist "authorship" extending through production and distribution to the reader, consumers today, as media journalist Virginia Heffernan writes:

> see themselves as doing business with television shows, movies, even books. They want to rate, review, remix. They want to make tributes and parodies, create footnotes and concordances, mess with volume and color values, talk back and shout down.[619]

This connectivity permeates the global art industry as well, with renewed tendencies toward collective activities reminiscent of the 1960s characterized by rejection of the isolated artist-object paradigm.[620] In its current iteration, the meaning of collaboration is fungible, enveloping a breadth of structural and methodological strategies involving, as critic Holland Cotter observes:

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[615] Linda Carroli, Virtual Encounters: Community or Collaboration on the Internet?" *Leonardo*, vol. 30, no. 5, Fifth Annual New York Digital Salon (1997), 359.

[616] The irony here is that artificial intelligence researchers in the 1980s employed a reverse metaphor, setting out the human brain and cognitive skills as a way of re-imagining the processing of data. As Sherry Turkle notes, "connectionism" -- a term attributed to University of California (Berkeley) computer scientist Jerome Feldman -- "began to present the computer as though it were an evolving biological organism. The neurons and pathways of connectionism were designed on the template of biology. Connectionism opened the way for new ideas of nature as a computer and of the computer as part of nature. And it thus suggested that traditional distinctions between the natural and artificial, the real and simulated, might dissolve." (Sherry Turkle, *Life on The Screen: Identity in the Age of the Internet* (New York: Simon & Schuster, 1995), 136 and 295, note 10).

[617] Kevin Kelly, "Scan This Book," *The New York Times Magazine* (14 May 2006), 45.

[618] Ibid.

[619] Virginia Heffernan, "Art in the Age of Franchising," *The New York Times Magazine* (20 January 2008), 21.

[620] Charles Green, *The Third Hand: Collaboration in Art from Conceptualism to Postmodernism* (Minneapolis: University of Minnesota Press, 2001). Green considers the ubiquity of artistic collaboration in the 1960s amidst the pursuit of 'alternative' art forms and interpretations of the individual and collective as artist.

> miniature subcultures known as collectives . . . in various sizes and formats: couples, quartets, teams, tribes and amorphous cyberspace communities. . . Membership may be official, or casual, or even accidental: friends brainstorming in an apartment or strangers collaborating on the Internet from continents away.[621]

Perhaps most notably, collaboration is now pervasive in the corporate mentality as a signifier of innovative best practice and employed ubiquitously in advertising and shareholder communications.[622] Cargill, a major player in the production and distribution of agricultural products, employs "collaborate > create > succeed" as its trademarked tag line to assert a commitment to "using its knowledge and experience to collaborate with customers to help them succeed."[623] Similarly, Accenture, a self-described global management consultancy, promotes collaboration as a transformative mechanism enabling its clients to become "high-performance businesses and governments."[624] Equally demonstrative is the "Connect & Develop" program of Procter & Gamble (P&G), intended to generate through external collaborations at least fifty percent of the company's new-product innovations.

> We've collaborated with outside partners for generations but the importance of these alliances has never been greater. Our vision is simple. We want P&G to be known as the company that collaborates -- inside and out -- better than any other company in the world.[625]

Here, interestingly, P&G at once proffers collaboration as a twenty-first century innovation equally applicable to internal and external relations with a rare nuanced acknowledgement that collaboration does indeed have a past.

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[621] Holland Cotter, "The Collective Conscious: Who Are These People?" *The New York Times*, Section 2, (5 March 2006), 1, 29. Also see Joel A. Slayton, "Collaboration as Media," *Leonardo*, vol. 35, no. 3 (2002), 231. "Over the past three decades, postmodern sensibilities have been realized in new modes of cultural production. Emerging information technology has enabled a redefinition of labor, creativity and communications. Implemented in alternative forms of organization and participation, these structures of collaboration operate as knowledge-production systems that serve to establish a context for meaningful discourse and critical analysis. In the economy of attention where ideas are product, collaboration is media. The common vocabularies of technology enable interdisciplinary exploration and cross-fertilization of intellectual terrain. And although art, science, and engineering have different agendas and methodologies an understanding of the benefits of collaboration among them has grown significantly. Institutional, corporate and private enterprise continue to adopt many collaborative organizational and operational frameworks into their bureaucratic design. A strong case can also be made regarding the influence of new collaborative models on popular culture and family and interpersonal relationships."

[622] For one interpretation of the distinctions amongst collaboration, cooperation, and competition in the corporate sector, see Karen R. Polenske, "Competition, Collaboration and Cooperation: An Uneasy Triangle in Networks of Firms and Regions," *Regional Studies*, vol. 38.9 (December 2004), 1029-1043.

[623] *A Closer Look at the Big Picture,* Cargill, Incorporated 2008 Summary Annual Report, 16.

[624] In its consumer advertising, Verizon Wireless furthers an unbounded view of collaboration by asserting that "we're all part of a team. Whether it's cell technicians working together to make sure every call gets through, or sales reps collaborating to help a customer, teamwork is a top priority." Verizon Wireless advertisement, *The New Yorker* (27 April 2009), 5.

[625] Steve Lohr, "How Crisis Shapes the Corporate Model," *The New York Times* (March 29, 2009, Business 4; and "*Connect + Develop*" program documentation, P&G (2008), 2.

Codification of Collaboration Redux

The presumption of a technology-collaboration nexus underlying this broader societal discourse extends to the contemporary architectural discourse. This techno-romanticism, again following Coyne, presumes that technology enables collaboration as a transformative practice, backed by a vast selection of software applications and web-based systems for intra- and inter-office design communication, information exchange, and visualization. In 2004, researchers from Texas A&M and HOK Advance Strategies tallied well over two hundred web-based communication systems, concluding that such technological solutions "will increase the speed of project processing and lead to financial gains or savings for the industry and owners."[626] Writer Rachel Adams asserts in an on-line essay sponsored by Adobe Systems -- a company that "revolutionizes how the world engages with ideas and information" -- that "if collaborators are smart and the software is smart too, the possibilities for creative innovation facilitated by technology are boundless."[627] Following the metaphor of connectivity, architect Thom Mayne acknowledges the substantive impact of technology on professional practice, observing in a discussion on building information modeling (BIM) the existence of "a new medium, a continuity, a flow of thinking, a design methodology which is more cohesive from the first generative idea, through construction, coordinating millions of bits of discrete data."[628]

Each of these optimistic views of a transformative technology presumes the existence of a practice structure and methodology for collaboration. Daniel S. Friedman, an architect and professor of architecture, foregrounds this point when noting that "although interoperability among the various trade-specific software applications is still a long way off, the true potential of this technology in practice (for architects) presupposes collaboration among all parties to the contract."[629] Yet, as Yehuda Kalay acknowledges in his writings on collaboration as an "enabling force," transformation of the fragmented design and construction industry attributable to the "growing technical, social, regulatory, environmental, and financial complexity of the built environment" cannot be achieved exclusively with technological overlays.[630] While

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[626] Eberhard Laepple, Mark Clayton, Robert Johnson, and Steve Parshall, "Content Analysis of Web-based Collaborative Design: Empirical Evidence of Design Process," undated publication, 116.

[627] "Adobe Reports First Quarter Financial Results," Adobe Systems Incorporated news release (March 2009), 3; and Rachel Adams, "All Together Now: Communication Networks and Collaborative Spaces," Adobe Design Center (www.adobe.com/designcenter/main.html), accessed 26 May 2009.

[628] Thom Mayne, "Change or Perish," *AIA Report on Integrated Practice - 1/11* (Washington, D.C.: The American Institute of Architects, 2007), unpaginated.

[629] Daniel S. Friedman, "Architectural Education and Practice on the Verge," *AIA Report on Integrated Practice - 0/11* (Washington, D.C.: The American Institute of Architects, 2007), unpaginated. Indeed, even within that segment of the technology industry focused on collaboration there is an absence of consensus on its meaning. Information technologists tend to think of collaboration, as Ned Kock explains in the inaugural issue of e-Collaboration, in terms of "business-to-business electronic commerce and virtual supply chain management." (Ned Kock, "What is e-Collaboration?," *International Journal of e-Collaboration*, vol. 1, no. 1 (January - March 2005), ii). Software developers, on the other hand, regard collaboration in entirely different terms, referring instead to digitized interaction modeled on in-person encounters, a difficult task given the already "perilous territory of multiplicity and ambiguity," as Coyne notes, in human speech and language (Coyne, 270).

[630] Yehuda E. Kalay, *Architecture's New Media: Principles, Theories, and Methods of Computer-aided Design* (The MIT Press, 2004), 399; and Yehuda E. Kalay, "P3 -- Computational Environment to Support Design Collaboration," *Automation in Construction*, vol. 8 (1998) 38.

> [s]uch a transformation depends on, and is shaped by technology, which provides a means of communication among the specialists and helps them individually gain access to knowledge and databases . . . it is not a simple addition of information technology to an existing process and organizational method. Rather it is a combined techno-organizational change, where the respective roles and links among the participants change along with the technology.[631]

Despite uncertainty that the design and construction industry is "amenable" to such techno-organizational transformation, the AIA seeks once again to codify collaboration as it endeavored to do under La Farge's watch, in this instance as a technological-enabled practice.[632] This objective prompted the AIA in 2006 to join with the Construction Users Roundtable and the Associated General Contractors of America to formulate the 3xPT Strategy Group, a "collaborative working group," charged with encouraging "work across traditional industry stakeholder boundaries."[633] Notably, key objectives of the group include elimination of linearity in the design and construction process through heightened attention to collaboration, "early contributions of expertise" amongst design and construction professionals, and "leverag[ing] the use of 3-D, 4-D, and 5-D modeling and other intelligent technologies."[634] An AIA-sponsored continuing education article appearing contemporaneously with formation of the 3xPT Strategy Group reiterates this theme, and specifically extends the definition of collaboration to envelop an array of alternative project delivery methods -- design-build, design-assist, bridging -- that engage the architect and contractor in variable contractualized and informal arrangements.[635] Most telling are comments by former 3D/I chair and CEO Charles B. Thomsen, who bluntly acknowledges that the principal motivation for such alternatives to the normative design-bid-build approach is that

> most knowledge of construction technology and cost is in the hands of specialty subcontractors and manufacturers, not architects and engineers. So we need to figure out contractual ways to engage subcontractors in the design-build process -- and get that brain power."[636]

Here, Thomsen foregrounds a critical issue. Despite a century of effort to establish and maintain the architect as arbiter of knowledge in the realm of architectural production, contractors have steadily come to dominate that sector of knowledge pertaining to constructional methodologies and, therefore, the realization of architecture. Thus, rather than monopolizing the market -- for Larsen, a defining objective for a profession -- architects find themselves on one side of a widening conception/realization divide, resorting to collaboration to span that gap

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[631] Kalay, *Architecture's New Media*, 416-417.

[632] Ibid.

[633] "CURT, AGC, and AIA Announce Plans to Work Toward Industry Process Transformation and Adopt 3xPT Strategy Group as Official Name," News Release by 3xPT Strategy Group (11 October 2006).

[634] Ibid.

[635] "Collaborating with Contractors for Innovative Architecture," AIA/Architectual Record Continuing Education Series, *Architectural Record* (October 2006), 185-188.

[636] Ibid.

while, problematically, insisting as in the past upon a leadership role for the architect "regardless of [project] delivery method."[637] In this context, as in the case studies, collaboration yet again is not a means of easing disciplinary boundaries; it is a codified mechanism to re-align under the architect's control divergent methods, motivations, and objectives long separated by specialization and disciplinary competition. Ostensibly intended to enhance fulfillment of client scope, scheduling, and cost objectives, the AIA agenda on behalf of practitioners invests in collaboration the capacity to sustain the architect's tenuous position in society, in this instance mediated by information and communication technologies.

By far, most indicative of this AIA effort to codify collaboration is the sustained promotion of Integrated Project Delivery (IPD), intended as a transformative means to "harness the collective capabilities" of clients, architects, consultants, contractors, and suppliers.[638] As the AIA promotes in journal articles, seminars, website discussions, and at its annual convention, IPD is a "project-centric" approach to architectural production "built upon" collaboration as a mode of collective action, employing an array of emerging "business structures, practices, and processes to collaboratively use the talents and insights of all participants in the design, construction, and fabrication process."[639] Key principles include "trust, transparent processes, effective collaboration, open information sharing, team success tied to project success, shared risk and reward" and maximization of advanced technologies, along with early involvement of "key participants," and the assignment of project responsibilities on a "best person" basis."[640] It is not surprising that the technology industry has been quick to pick up on the IPD paradigm, with new project management software offerings to facilitate integration practices. Promotional material for Kalexo Teamwork, for instance, suggests it "seamlessly combines advanced task management with communication tools such as file sharing, online meetings and video chat" in support of the "deeply collaborative" IPD process that can "increase project velocity and reduce project risk."[641]

Further evidence of the IPD strategy is the latest generation of AIA contract documents, which employ a new vocabulary reflective of shared responsibilities and liabilities -- "single purpose entity," "project alliance agreement," "best-for-project," "integrated project coordinator" -- paired with a phasing protocol for "blame-free performance" through consensus-based

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[637] Ibid., 188. A newsletter published by the California chapter of the AIA suggests differences between association and collaboration. In a section entitled "Architects Practice Act: Regulatory Changes," there is a summation of revisions to California Code of Regulations section 134 (Architectural Business Names) and "the elimination of section 135 (Association)." The authors explain that as a result of these revisions, "architects are not prohibited from associating with or collaborating with unlicensed persons. BPC section 5535 describes the forms of business entities and collaborations that architects may use for the practice of architecture. The elimination of this regulation removes the confusing language related to the statutorily unsupported concept of a 'joint' offering of architectural services. The revised regulations make it much clearer that architectural services must be provided by an architect or under his or her responsible control." ("Architects Practice Act: Regulatory Changes," *California Architects*, *A Publication of the California Architects Board*, (Winter/Spring 2009), 9).

[638] "Essential Principles and Business Models," *Integrated Project Delivery, A Working Definition Version 1* (15 May 2007), 2.

[639] *Integrated Project Delivery: A Guide, version 1*, AIA National and AIA California Council (2007), 7; and "Essential Principles and Business Models,", 1-2.

[640] Ibid.

[641] "Kalexo Introduces Integrated Project Delivery Platform for the AEC Industry," Kalexo news release (17 February 2009.

decision-making and collaboration.[642] The AIA glossary in support of the new IPD vocabulary includes an entry for collaboration, but its definition -- a "process or mind-set by which all integrated parties involved in a project are willingly doing whatever it takes to work together in concert to, design, construct, and make decisions solely for the good of the project"-- offers scant pragmatic guidance to practitioners, while proffering collaboration as a sacrifice of the individual in favor of collective interest and obscuring the asymmetrical benefits accruing from the process.[643] The intrinsic quandary here is that if indeed collaboration is a process, what are its means and methods? If, alternatively, collaboration is a mind-set, what are the conditions necessary to attain it? The silence on these points leaves B. J. Novitski, a regular contributor to *Architectural Record*, little to offer other than the recommendation that IPD participants "forego a certain degree of self-interest in deference to project goals" on the premise that project goals exist independently of individual motivations and desires.[644]

While the AIA endeavors to promote IPD as a model of architectural practice for the twenty-first century, the ambiguity of collaboration and exhortations in IPD literature -- "realize . . . highest potential as designers and collaborators," "future perfect vision," "break down traditional barriers," "change is happening," "talk, share, collaborate, experiment" -- disconcertingly mirror the corporate fascination with collaboration along the lines of Cargill's "collaborate > create > succeed" marketing effort.[645] The discourse surrounding IPD, furthermore, presupposes collaboration as a contemporary innovation disassociated from the past, exemplified by Novitski's and Andrew Pressman's principal characterization of IPD as a response to twenty-first century market demands for efficient project delivery mechanisms and buildings.[646]

Indeed, for all of its seemingly innovative characteristics and vocabulary, closer examination of IPD evidences commonalities with past AIA agendas of collaboration. The concerted effort championed by La Farge leading up to the 1927 annual convention as discussed in the first case study was similarly an effort by the AIA to codify collaboration as an architectural practice. Terms such as "understanding," "sympathetic," "united effort" captured the spirit of the moment, and sparked pre- and post-convention journalistic attention to

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[642] *Integrated Project Delivery: A Guide*, 53-55; and "Essential Principles and Business Models," 10.

[643] Integrated Project Delivery: A Working Definition, Sacramento: AIA California Council (2007), 10. Traditional project delivery phase names are revised under IPD: "conceptualization" in lieu of programming); "criteria design" in lieu of schematic design; detailed design in lieu of design development; and implementation documents in lieu of construction documents (*Integrated Project Delivery: A Guide*).

[644] B. J. Novitski, "New AIA Agreements Support Integrated Project Delivery," *Architectural Record*, (July 2008), 59.

[645] Norman Strong, "Introduction," *AIA Report on Integrated Practice,* Washington, D.C.: The American Institute of Architects (2007), 2; and *Integrated Project Delivery: A Guide,* 52.

[646] In his discussion of IPD, Pressman highlights a number of "significant consequences" of IPD on "firm culture, standard contracts, liability insurance, risk management, compensation, and professional education," but in concluding that "[p]erhaps the biggest cultural change is . . . the attitude adjustment required to collaborate with the entire team from the start," he sidesteps the historical significance of collaboration to the profession (Andrew Pressman, "Integrated Practice in Perspective: A New Model for the Architectural Profession," *Architectural Record* (May 2007), 116). See also Andrew Pressman, "Practice Matters: It's a Very Good Time to Develop Your Firm's Collaboration Skills," *Architectural Record* (April 2009), 47-48.

collaboration not seen since the 1893 World Exposition in Chicago.[647] In the mid-1960s, the AIA jointly published with six other professional associations a *Professional Guide to Collaboration,* employing principles and terminology barely distinguishable from recent IPD literature: "dignity," "respect," "exchanging information," "close collaboration" from the "very earliest stage," and attention to "adequate compensation" for all participants.[648] Against the familiar background of increasing scale and complexity of environmental challenges, the guide calls for "the merging of design services through collaboration . . . to produce unified and harmonious results…by environmental design professionals in the interests of their clients and public."[649] As with IPD insistence on the architect maintaining control of collaborations, there was to be a distinct leader in this 1960s iteration, but as a reflection of its interdisciplinary authorship, the guide allowed for the possibility that a representative from any of the disciplines might serve as "prime professional," with the appointment premised on "design ability, professional reputation, demonstrated competence, practical efficiency, business capacity and integrity, good judgment and ability to obtain the cooperation of those involved in a project."[650] In a twist of irony, these were the very characteristics architects had once employed defensively to articulate their own identity and to distinguish themselves from the competing professions with whom they were now called upon to collaborate as equals.

While this commonality with the past diminishes the purported innovative character of IPD, more problematic is a resistance in the contemporary discourse to interrogating that past. In one form or another, each of the moments in twentieth-century discourses examined in this study may be characterized by a clear linkage with the past: La Farge and Lescaze, despite wholly disparate stylistic affiliations, sought inspiration in antiquity and the Renaissance; Kohn's problematization of professional relations rested on his grasp of the historical rise and boundary-making of specialized disciplines; and Chermayeff looked to the centuries-long history of collective action in the sciences as a model of practice. Yet, other than scholarly re-categorizations of architects' relations with non-architect 'others' as collaboration, and broad generalizations of the historically collaborative character of architectural production -- that is, architects do not produce buildings in isolation -- the contemporary discourse leaves little intellectual space for the historical problematics of collaboration and its engagement in the crafting of architectural identity, authority, and authorship. Instead, architects continue to assert the fundamentally collective nature of architecture -- and collaboration as the ideal collective action -- while stubbornly clinging to authority of architectural production and aspiring to media-

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[647] *AIA Proceedings* (1927), 143. See also the AIA Proceedings from the following year: "Any work representing the unified expression of the talents of two or more artists depends for its success upon their ability to perform in their allotted tasks with the understanding, and the sympathy necessary to the creation of an harmonious whole. It is, therefore, evident that the first requirement of a successful collaboration is the selection of men capable of working together with a high degree of broad appreciation of the characteristics and limitations of each field of art and with mutual sympathy and esteem. Leadership is necessary in artistic collaboration as it is in team work of any other kind. As a general rule such leadership arises naturally from the nature of the problem at hand and from the character, ability and personality of the collaborators. It may be assumed, however, that where the elements of of the problem are predominantly in the field of one art, the representative of that art should be the logical leader. Wherever possible, the collaborators should be called together at the inception of the work and all studies, especially at the preliminary stages, made in frequent consultation with all collaborators engaged and with the client" (*AIA Proceedings* (1928), 10).

[648] "Guide to Professional Collaboration," *AIA Journal*, vol. 46, no. 1 (July 1966), 65-68.

[649] Ibid., 65.

[650] Ibid.

enhanced authorship for its outcome. It is an anachronistic paradigm, however, that runs counter to normative practice in which architects craft only representations of architecture; they are critically reliant upon others for its physical realization.[651] Moreover, as the outcome of over a century of specialist tendencies and a twenty-first century shift toward the unbundling of services, the architect contributes but a portion of the graphic representation necessary to realize a building, having over time bequeathed to non-architect 'others' substantial tasks and responsibilities in the design and documentation process.[652] In this light, continued resistance by architects to sharing authority and authorship with those who participate in the representation and realization of architecture seems unsustainable.

Implications and Concluding Remarks

From one perspective, the contemporary discourse on collaboration captures the essence of architecture as a profession, a fluid and protracted overlap of re-invention and re-fashioning of identity in the presence of variable socio-economic forces external to the profession. From another perspective, it suggests that the identity of the profession -- variously aligned with the arts and sciences over time yet seemingly always nuanced toward architectural authority -- may be irreconcilable with collective action as idealized. Lacking autonomy and the capacity to monopolize its field of action amidst a wealth of professions operating in the built environment, to follow Larson, the architectural profession continues to a great extent to be defined by what it is not; it is reliant upon the continued presence of the very boundaries that contemporary collaboration ostensibly seeks to erase or blur. For, absent these boundaries, the architect's identity -- along with co-mingled issues of authority and authorship -- loses its disciplinary clarity. This is the case not only in collaboration with non-architect 'others,' but in 'co-architect' arrangements that split design/production responsibilities, when interdisciplinarity exists within individuals such as Santiago Calatrava and Cecil Balmond, and even when the unbuilt imaginations of star architects hang on gallery walls while artists transform public and private spaces into vibrant places. [653]

The implication here is that the contemporary discourse on collaboration -- intent as it is on obliterating spatial, temporal, personal, or disciplinary boundaries -- should be seen as problematic for the architect. The unbounded collaboration it suggests for architects, coupled with free-flowing information and communication networks that allow, for instance, clients to directly access alternative product specifications or communicate directly with contractors, strains the architect's identity and ability to participate in that flow while retaining control of the process and outcome of architectural production. Any effort to produce the opposite condition -- bounded collaboration -- would be equally problematic for the architect, for it would prompt

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[651] Tim Anstey, "Architecture and Rhetoric: Persuasion, Context, Action," in Tim Anstey, Katja Grillner, and Rolf Hughes, eds., *Architecture and Authorship* (London: Black Dog Publishing, Ltd., 2007), 18.

[652] For evidence, one need only compare Wilfred Beach's 1914 assessment of the architect's extensive responsibilities and tasks with the table of additional services included in the AIA B101-2007 Owner-Architect Agreement (Wilfred Beach, "The Architect," *Architectural Record*, vol. 35 (May 1914), 425-434.

[653] Nicolai Ouroussoff, "An Engineering Magician, Then (Presto) He's an Architect," *The New York Times* (26 November 2006), 25; Miwon Kwon, "Promiscuity of Space: Some Thoughts on Jessica Stockholder's Scenographic Compositions," *Grey Room*, vol. 18 (Winter 2004), 52-63; and Kent Bloomer, "The Confounding Issue of Collaboration Between Architects and Artists," *Places: A Quarterly Journal of Environmental Design* vol. 7, no. 4 (1992), 58.

uncomfortable questions from the past as to how it might be delineated. Would engineers once again be excluded, as with La Farge, Lescaze, and Chermayeff? What of clients and contractors?

Moreover, as we now see from this study, there exists a host of uncontrollable, unpredictable, and often irreconcilable human considerations that undermine agendas of collaboration and concomitant notions of community. These are the variable motivations, objectives, temperaments, experiences, methods, organizational structures, and politico-economic considerations that thwart realization of Galison's "trading zone" or Habermas' "ideal speech situation." This is the point at which technological connectivity as metaphor and model for collaborative human interaction faces its biggest challenge, for pixels of data have neither personality nor emotion, neither ulterior motive nor conflicting priorities.[654] As Howard Rheingold notes, technology may facilitate the connecting of humans through "collaborative" endeavors such as document generation and modification but it does not necessarily correlate to "consensus and decision-making."[655] "On-line conversations, Rheingold continues, "tend to diverge and branch and digress, rather than converge."[656] Linda Carroli further observes that, although "community" is a "nebulous social form, it nevertheless alludes to something that is whole and often geographically contingent, complying with ideas about metanarratives that deny and falsify difference."[657] The connectivity of data and the digital networks that support it "impinge on that order by providing an alternative field in which to perform connection and interactivity, to activate difference and fragmentation, and to accentuate rootedness to a place."[658] These distinctions, she argues, preclude mere transference of community and communality historically associated with face-to-face collaboration - think here of La Farge's clubbing, Kohn's tight-knit business network, or Chermayeff's circle of academic and professional contacts -- to a virtual context. "Computer-mediated interactions are collaborations based on processes of interactivity, connectivity, and encounter, they are ephemeral performances of multiplied and shifting identities."[659] Carroli ultimately concludes that in "the fragmented space provided by the Internet, consensus is impossible and irrelevant, a utopian ideal."[660] Coyne follows suit with the observation that

> digital narratives are utopian in the sense that they give credence to information technology as a means of realizing the Enlightenment project of a world where reason holds sway over unreason, and as a consequence people are free, equal, and in harmony.

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[654] Moreover, as Poggenpohl notes, humans "have limits to their ability to be process connected" Poggenpohl, 147.

[655] Howard Rheingold, *The Virtual Community: Homesteading on the Electronic Frontier*, Cambridge, MA and London: The MIT Press, 2000, 339. Rheingold observes that "online interactions are influenced by the lack of corporeality. In some cases, this works to the benefit of communication; in other instances, it damages the communication. The absence of our bodies and the conveyance of nuance that accompanies body language and tone of voice, coupled with the ease of access to the attention of many people, also makes social cyberspace susceptible to certain human foibles" (330).

[656] Ibid.

[657] Linda Carroli, "Virtual Encounters: Community or Collaboration on the Internet?" *Leonardo*, vol. 30, no. 5, Fifth Annual New York Digital Salon (1997), 360.

[658] Ibid.

[659] Ibid., 362.

[660] Ibid., 361.

> Clearly, this project is not yet realized but is a projection into another world, a burden for the future.[661]

It seems then that the technology underpinning the twenty-first century idealization of collaboration -- the one critical characteristic that distinguishes it from earlier twentieth-century iterations -- must overcome not only variable human interactions, in a pursuit for connectivity it must also overcome its own substantial idealization/realization divide. This suggests that contemporary technological efforts to close the collaborative divide, to resolve the innumerable structural and procedural challenges to optimizing communication across disciplinary boundaries -- notwithstanding the recurrence of transformative promise -- may be as ineffectual as its predecessors.

This leads to several interesting questions. If architectural production indeed relies upon collective action but the transformative promise of collaboration as idealized past and present is both unrealizable and oppositional to the timeless quest for identity, authority, and authorship, how might architects re-frame collaboration and their own participation in it? In the absence of re-framing, will collaboration be relegated, as in the literary arts, to merely critiquing the collective nature of architectural production while failing as normative practice? Or, as Forty suggests for the word 'form,' a term that once held great significance to the architectural profession, will collaboration outlive its "usefulness"?

> People talk *of* form all the time but they rarely talk *about* it; as a term it has become frozen, no longer in active development, and with little curiosity as to what purposes it might serve.[662]

Are there perhaps another set of questions that should be posed, questions pertaining to the disciplining of labor occurring as an outcome of collaboration? Is the leveling of decision-making and knowledge-sharing idealized in the twenty-first century iteration of collaboration masking a means of enhancing productivity of lower-level and lower-paid employees? How might collaboration be positioned relative to post-Fordist practices facilitated by technology such as job-sharing and the off-shoring of labor? What are the future implications for collaboration given the over-supply of architectural school graduates and a diminishing demand for their services?

These and other questions remain for future investigation but, for the present, it is reasonable to conclude that realization of the transformative promise for collaboration in the twenty-first century will fall short of its technologically-engaged idealization. It is, furthermore, far more likely that contemporary efforts to craft and re-fashion architectural identity, authority, and authorship -- as I have demonstrated for the twentieth-century iteration of the discourse -- will only serve to perpetuate the collaborative divide between idealization and realization, and between architects and non-architect 'others.'

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[661] Coyne, 25-26. See also Saskia Sassen and Manuel Castells contributions to William Saunders, ed., *Reflections on Architectural Practices in the Nineties* (New York: Princeton Architectural Press, 1995).

[662] Forty, 172.

ILLUSTRATIONS

Image 1.
C. Grant La Farge

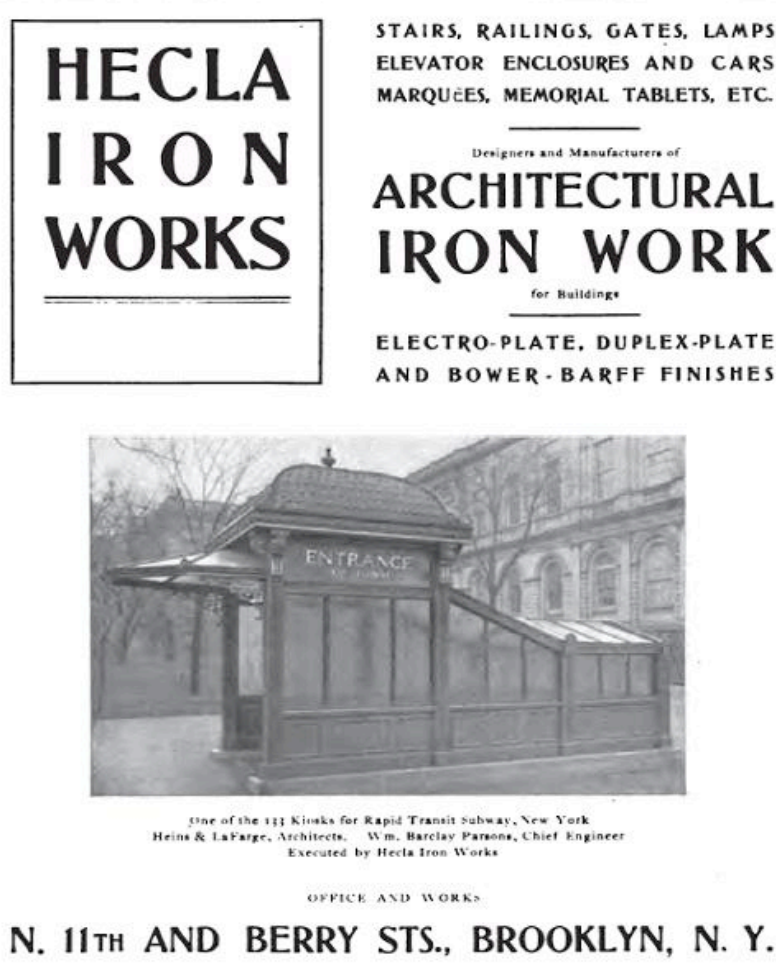

Image 2.
Hecla Iron Works advertisement with subway kiosk designed by Heins & La Farge

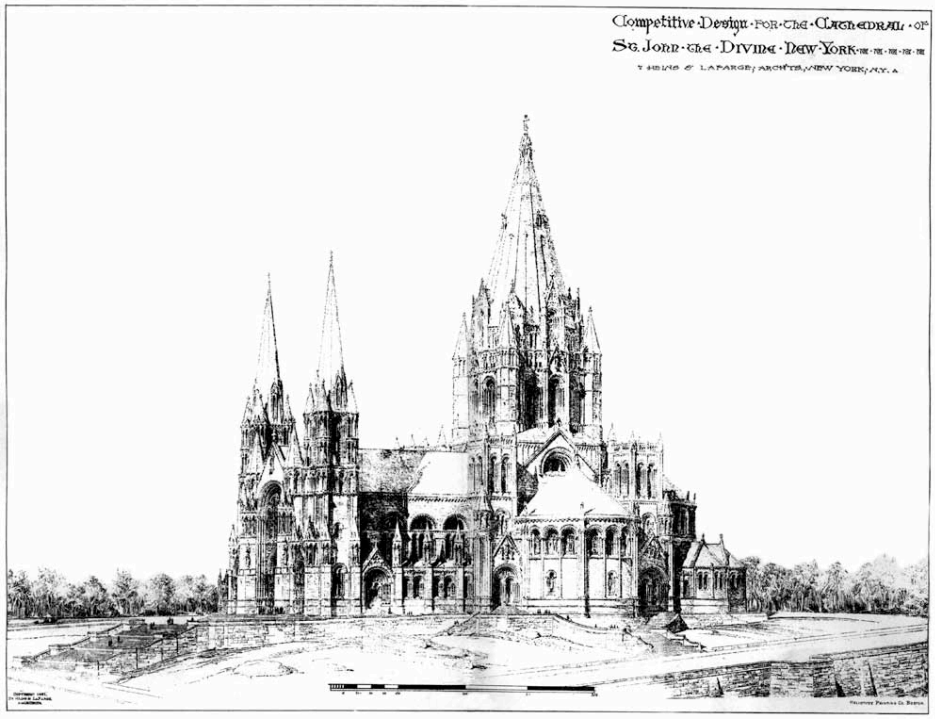

Image 3.
Competition submission by Heins & La Farge for the Cathedral of St. John the Divine, New York City

Image 4.
R. Guastavino Company advertisement

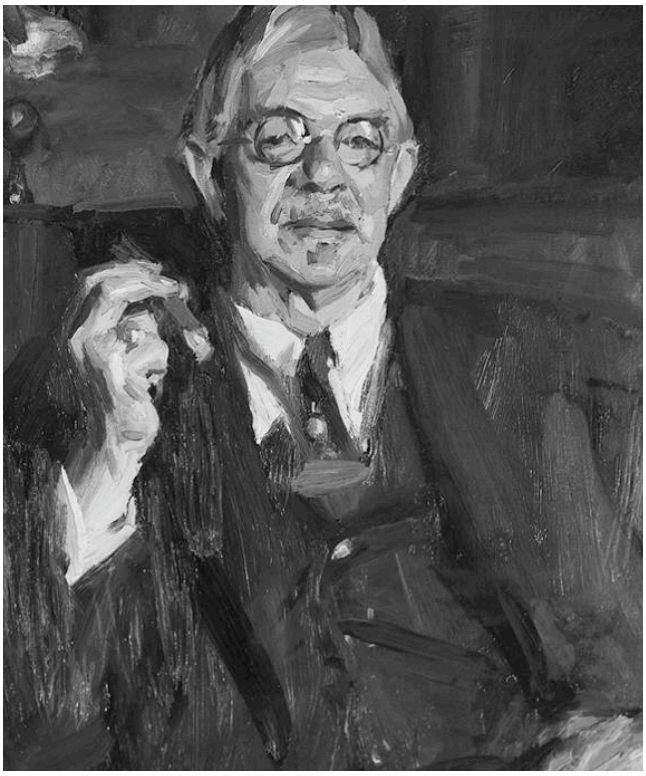

Image 5.
Portrait of Royal Cortissoz by Louis L. Betts

Image 6.
Cunard Building, New York City

Image 7
I. A. Namm department store, New York City

Image 8
Philadelphia Saving Fund Society (PSFS) building, Philadelphia

Image 9
Williamsburg Houses, New York City

Image 10
Williamsburg Houses, New York City

Image 11
Perisphere and Trylon at the New York World's Fair of 1939-40

Image 12
Democracity exhibit at the New York World's Fair of 1939-40

Image 13
Serge Chermayeff

Image 13
De La Warr Pavilion, Bexhill-on-Sea, East Sussex, England

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