

## The Political Economic Structure of Early Media Reform Before and After the Communications Act of 1934

**ABSTRACT** This paper examines how early media reform work evolved from political activism into a system-building advocacy campaign in support of Schools of the Air between 1930 and 1940. Calling upon archival work that focuses on 1935–1940 records, it examines how prominent activist groups the National Committee for Education by Radio (NCER) and the National Advisory Council for Radio in Education (NACRE) shifted their strategic approaches to adjust to the “public interest” mandate of the Communications Act of 1934. Though scholarship has chronicled disagreements between the NCER and NACRE over how to best support educational broadcasting, a dialectical interplay emerged after the act during the New Deal due to the influence of the Federal Radio Education Committee (FREC). FREC inspired A.G. Crane of the NCER to build the Rocky Mountain Radio Council (RMRC). The RMRC was the first sustainable educational media network, and the group coined the term *public broadcasting*. While the Communications Act signaled the end of the first wave of media activism, the policy also inspired reformers to develop a new system-building strategy that set the groundwork for NPR and PBS. **KEYWORDS** media reform, Schools of the Air, public media, media activism and advocacy, Communications Act of 1934

One path deserving of more attention in media history research pertains to which media activist and advocacy strategies have succeeded at changing policy, regulation, and how media industries are organized and produce content. The study of how media industries are organized has provided media activism scholars with two methodological dividends. The first is that when a media system devises a sustainable division of labor, relations endemic to its production culture can be traced from concept, through development, to a final product and its public reception.<sup>1</sup> Second, the process relationship between a mission statement and the development of representational codes can be empirically mapped from concept through production, distribution, and audience testing, as those codes are circulated to a broader public as “official knowledge.”<sup>2</sup>

As Stuart Cunningham and David Craig have argued,<sup>3</sup> to this point media scholars have under-researched the crucial historical sociological dimensions of media development practices. This is true to the surprising extent that the field of U.S. media studies still has not produced a comprehensive account of how noncommercial media industries emerged, evolved, and became public, community,<sup>4</sup> and college<sup>5</sup> broadcasting. However, recent scholarship has begun to rectify this omission through the application of media industry and textual analyses,<sup>6</sup> ethnography,<sup>7</sup> and development research,<sup>8</sup> in pursuit of understanding U.S. public media’s unique properties, genealogy, and organization. Noncommercial media began as a social movement composed of philosophical, productive, evaluative,

---

*Resonance: The Journal of Sound and Culture*, Vol. 1, Number 3, pp. 244–266. Electronic ISSN: 2688-0113 © 2020 by The Regents of the University of California. All rights reserved. Please direct all requests for permission to photocopy or reproduce article content through the University of California Press’s Reprints and Permissions web page, <https://www.ucpress.edu/journals/reprints-permissions>. DOI: <https://doi.org/10.1525/res.2020.1.3.244>

regulatory reform, and activist proponents. Reformers focused on carving out a special niche for nonprofit use of sound communications technology within the broader American media landscape, and political economic media research is one legacy of their work.<sup>9</sup> Noncommercial media industries similarly surfaced with different concepts about the purpose of media than commercial broadcasters, and consequently, a different mission statement on how radio can be designed to serve audiences.<sup>10</sup> Fidelity to noncommercial media principles gave form to one of the earliest articulations of media activism.

Much of the energy of early media reform revolved around writing and circulating mission statements in defense of Schools of the Air. As Avery,<sup>11</sup> Slotten,<sup>12</sup> and Engelman<sup>13</sup> have written, U.S. noncommercial media history is replete with paper trails that detail reform activism on behalf of the expansion of audio educational extension services.<sup>14</sup> Reform groups typically collaborated across sectors<sup>15</sup> and often worked parallel to commercial trade organizations such as the National Association of Broadcasters (NAB).<sup>16</sup> The constellation of institutions working in support of sound educational media across public and private sectors between the 1920s and 1970s influenced the later shape of public broadcasting and attracted the loyalty and labor of media producers across both public and private sectors.<sup>17</sup> Looking to this cross-sector dynamic helps to clarify why specific historical activist practices, educational genres, and strategies were selected and composed the idiosyncratically decentralized U.S. public system.

Understanding the nonprofit thrust of educational and public media history has become all the more pressing. In 2020 COVID-19 has forced many university systems to essentially reinvent School of the Air discourses under the auspices of digital distance learning. With few exceptions, reform history has been dedicated to issues of public access and unencumbered educational experimentation. Digital distance learning remains an important tool for adult students, but a new cabal of privatization activists have appropriated the language of reform, with the goal of transforming public education into a regime of third-party providers. For this reason it's crucial to reclaim the early political economic, equitable vision that inspired Schools of the Air. Noncommercial media history research can help to retrace and revivify a 90-year tradition of activism around democratic access to information and can serve as a contemporary strategy to reoccupy debates about the civic purpose of technology.

It's an especially advantageous time to unearth stories of progress—and especially victory—from the annals of reform history.<sup>18</sup> Critical scholarship on noncommercial media sometimes overshadows its successes and overly focuses on its shortcomings. Part of this narrative follows from the towering work of Robert McChesney in *Telecommunications, Mass Media, and Democracy*,<sup>19</sup> which frames a rich period of educational activism as a failed enterprise that left the United States with corporate media governance. McChesney's account of the post-1934 U.S. ownership environment of course continues to ring true, especially taking into account the Federal Communications Commission (FCC) repeal of net neutrality in 2017. The U.S. broadcasting system is overwhelmingly deferential to private service providers and corporate interests. But by looking to the work of noncommercial media activists during the 1930s for their innovations, instead of that moment's systemic failure, scholars are provided not only with an

alternative history and logic to commercial media but also a valuable case study in the ways that reform agents and even FCC commissioners<sup>20</sup> adjusted to political and organizational changes, in their mission to promote equal access to education.

This paper examines the intermural arc of educational grassroots, regulatory, philanthropic,<sup>21</sup> and activist work around Schools of the Air before and after the Communications Act. Reformers exhibited a stark contrast in strategy before and after 1934, which might be characterized as a transposition from an activism that attempted to frame terms for a debate already in progress to a system-building advocacy, which built a bottom-up<sup>22</sup> media infrastructure for educational broadcasting.<sup>23</sup> As discussed by Allison Perlman<sup>24</sup> and Victor Pickard,<sup>25</sup> the primary occupation of the media reform movement after 1934 evolved to grapple with the system that was in place to include grant writing, radio station construction, and regulatory lobbying.

Typically painted as the victory of privatization, of a paradise lost that precluded the United States from developing its own BBC, new archival research reveals that the same activist groups detailed in McChesney's book—The National Committee for Education by Radio (NCER) and National Advisory Council on Radio in Education (NACRE)—were galvanized by the act and played central roles setting the foundation for U.S. public media. Unfriendly to educational broadcasters focused on distance learning in 1934, as David Goodman has noted,<sup>26</sup> the Communications Act produced inevitable as well as unexpected organizational changes to the U.S. media system. The inevitable outcome was that, as McChesney brilliantly details, roughly 85% of university broadcasters lost their licenses in 1935 due to the act's emphasis on free-market technocracy, effectively destroying early distance-learning experiments at dozens of universities. The unexpected outcome was that the public interest mandate of the act also articulated the first institutional standards for sound broadcasting practice, setting in motion a series of strategic shifts within the media reform movement between 1935 and 1940, in which advocates developed specializations in audio production, research, and content distribution.

Less discussed by media history research, before 1934 activist research was hampered by the inefficiency of School of the Air experiments, which were marked by inconsistencies in radio station maintenance, aesthetic delivery, and coordination.<sup>27</sup> This paper argues that it was in part due to the under-examined ineffectualness of educational radio, and the need for more time, that reformers first organized to lobby for set-aside frequencies. This paper places special focus on the work of the NCER, in particular how A.G. Crane, president of the University of Wyoming and NCER co-chair, was able to procure Rockefeller Foundation funds to construct the first School of the Air network under the moniker of the Rocky Mountain Radio Council (RMRC). In the process Crane labeled his work "public broadcasting" to describe how the RMRC both served public education and met regulatory mandates for public interest, representing the first coinage of the term. Examining NCER and NACRE strategy before and after the Communications Act chronicles the slow, ad hoc, trial-and-error procedures of media reform, as advocates carved out a special cultural role for education within a commercial-friendly media landscape. In the process they assembled the technical and epistemic foundation for noncommercial media industries NPR and PBS.<sup>28</sup>

## THE DISORGANIZATION OF EARLY DISTANCE LEARNING: SCHOOLS OF THE AIR PRE-1934

As Katie Day Good has recently pointed out,<sup>29</sup> early distance education was designed to address the deficiencies in access, in accordance with state goals to provide free education to every possible student, regardless of age or station in life. This endeavor was articulated in public university mission statements such as the “Wisconsin idea,” and in particular at land-grant universities, which saw media as a basic service that might promote the undertaking of making public education a nexus of economic and cultural activity in each state. The earliest Schools of the Air were founded as extension services of university distance learning. The first distance-learning program was founded at Pennsylvania State University in 1892 to serve rural and adult learners.<sup>30</sup> It wasn’t until the 1910s that most universities offered correspondence services. Educators began to congregate over the question of how radio might be put in service of compulsory educational strategies in the early 1920s.

The Association of Colleges and University Broadcasting Stations (ACUBS) was founded in November 1925 to raise awareness about distance-learning practices after the Fourth National Radio Conference in Washington, DC.<sup>31</sup> Stations were widely separated geographically, and most early discussions revolved around how to best translate university programs to radio.<sup>32</sup> Taking their cue from the precedent of the “modern school,”<sup>33</sup> early practitioners believed that the creation of an ethereal “social center” would encourage a civic-based democratic sphere in promotion of social equity through continuous participation, regardless of place.<sup>34</sup> In determining how technology might be used for educational purposes, practitioners emphasized basic tenets of educational access via technology across three recurring arguments: (1) educational radio should be a nonprofit institution, (2) its purpose was to serve underrepresented populations and educational efforts, including farmers, and (3) as a national association, its mission would be to describe the state of the union of educational radio.

In its nascent state, educational radio was strong in philosophical vision but weak in practice. Calling upon Deweyan models of experiential learning, letters between practitioners often detailed competition between commercial broadcasting and university extension services.<sup>35</sup> Like the project of public education, educational radio took on the rhetoric of nonprofit, public-facing education by technology. Educators were further compelled to distinguish their practice from commercial stations in clear terms, which led them to settle on a nonprofit vision. For example, one educational broadcaster asked of his colleagues: “What is the fundamental purpose of any school owned broadcast organization? To educate as many persons as possible and to disseminate as much accurate and reliable information as it can.”<sup>36</sup>

But universities largely took the logistics of radio practice for granted,<sup>37</sup> and educational radio stations lacked a coherent pedagogical methodology. In the 1920s and early 1930s stations could not afford experienced staff or remuneration of talent.<sup>38</sup> In 1932, one report noted that of 49 stations surveyed, 17 were forced to sell time to advertisers to subsidize the station’s activities and fees just to pay for transmitter or line rental costs.<sup>39</sup>

Educational practitioners consequently had little to differentiate their work from commercial stations. University stations put little if any of those funds into actual production development, and by and large early distance learning was a ramshackle enterprise. By 1933 educational radio practice had become cause for alarm. Morse Salisbury of the U.S. Department of Agriculture distributed a departmental report titled “Educational Broadcasting in 1928–1933” that painted a grim picture of the performance of educational radio. “Previous hopes surged high and public prints teemed with glowing predictions,” but by 1933 the poor quality of educational broadcasts had “exploded” his belief that radio had “magical powers of education.”<sup>40</sup> The Department of Agriculture ceased its support of multiple educational broadcasters in 1933 and began to work with third-party entities, which at that moment provided a more efficient implementation of educational technology than universities.

The Office of Education noticed that university radio experiments little resembled the curricular progress expected of their counterparts in public schools. In a 1931 letter, the Office of Education implored universities to train speakers for broadcast instruction and prepare adult learners to engage with live lectures from classrooms. The Office of Education compelled ACUBS affiliates to treat broadcasting as a “highly specialized art,” which would include not only lectures and testing but also microphone technique related to diction, pronunciation, articulation, tone quality, accent, and general cultural effect—all of which needed to be addressed for pedagogy to be effective.<sup>41</sup> For educational radio to succeed, Schools of the Air had to translate ideals stemming from equal access to education into technical practices that supported, maintained, and cultivated a functional radio station. But core ACUBS members could not catch up. ACUBS President and University of Illinois Professor Joseph Wright openly wondered if educational stations should look to the “radio-formatting success of NBC,” but members the association sought to separate the tenor of nonprofit practice from the networks.<sup>42</sup> The ACUBS began to circulate semiannual, unofficial recommendations for radio practice, but stations did not come to terms on a common formula that they might equally emulate.

#### **THE PUBLIC INTEREST MANDATE AND THE ACTIVATION OF THE PHILANTHROPIC WING OF THE MEDIA REFORM MOVEMENT**

The instability of early educational radio became a common topic of conversation across stakeholding institutions, and supporters convened a concerted effort to protect non-commercial radio in spite of its slow growth.<sup>43</sup> It was clear from the outset that it would take some time for educators to streamline technical practices, and by the late 1920s the Office of Education, Department of the Interior, and philanthropic groups hoped to help university broadcasters develop a nonindustry model for progressive-era programs in folklore, localism, and compulsory education. However, before educators were able to establish best practices and a mission statement, the Radio Act of 1927 was passed, setting a path dependency for manufacturers to dominate the airwaves.<sup>44</sup>

Previous to 1927, radio had been regulated by the Commerce Department. The Radio Act, written by Senators Clarence Dill and Wallace H. White, separated the

United States into five regional zones and created the Federal Radio Council (FRC) to determine conditions for frequency licenses. But there was no preset standard for how to determine how one station was more deserving of a frequency than another. As McChesney and Sloten have noted, the FRC reorganized frequency assignments into “clear, regional, and local” licenses with General Order 40 in 1928, under the stipulation that the most important responsibility of licensees was to provide reliable radio coverage for listeners. RCA and regional commercial radio stations expedited “public” access with all-day programming, while university stations struggled to reach listeners. And there were a limited number of broadcasting channels.<sup>45</sup> Instead of weighing the content or public need, the FRC interpreted “public interest” terminology in the Dill-White bill as deference to technical requirements set by radio engineers, which at the time seemed to be the least controversial path. It was difficult to provide a logical explanation for why one station that produced a specific genre should receive different treatment than a station focused on another genre. But the FRC made little regulatory note of civic contribution, besides localism and provisions for live talent.<sup>46</sup> It was a convenient decision since RCA had built the wires, receivers, and aggregating radio talent for public infrastructure.<sup>47</sup>

The consequence of emphasizing technics was twofold. The first consequence was that “public interest” came to be synonymous with applicants who began with a head start—besides Wisconsin, Ohio State, and Iowa State the only applicants able to meet these criteria were corporations and regional advertising-supported stations that could maintain costly equipment for periodic reapplication for licensure. As Susan Smulyan has written, advertising income played a role in hastening the institutionalization of the free-market broadcasting model in the United States.<sup>48</sup> Discussions around media policy began to reflect technocratic language of “public interest” in every area of radio—beginning with station maintenance, but eventually in qualitative areas such as measuring audience response to broadcasts.<sup>49</sup>

After the Radio Act, Fredrick Paul Keppel of the Carnegie Corporation and American Association for Adult Education (AAAE) came into contact with General Charles McKinley Salzman of the FRC to inquire about how radio frequencies might additionally serve national interest through education—without interfering with the developing commercial industry, the government, or the general public.<sup>50</sup> They determined they should organize a group to keep communication lines open between each sector. Keppel persuaded John Rockefeller Jr. to finance an ongoing discourse about cross-sector collaboration, which piqued the Rockefeller Foundation’s early interest in media.<sup>51</sup>

In 1928 Herbert Hoover appointed Ray Lyman Wilbur as the Secretary of the Interior. At a White House dinner, Keppel persuaded Wilbur that the AAAE could collaborate with the FRC to address issues in educational access under conditions of frequency scarcity.<sup>52</sup> Wilbur compelled Commissioner of Education William John Cooper to initiate Keppel’s concept by organizing a conference to discuss mutual concerns shared by the industry and the public sector. In 1930 Levering Tyson was hired by Keppel to form the National Advisory Council on Radio in Education (NACRE), which Keppel tasked with putting different sectors into conversation to identify a common social goal

for radio. The NACRE was designed to organize conferences and keep a national conversation going about prospects for collaboration between sectors.

Commissioner Cooper's meeting also inspired the founding of the National Committee on Education by Radio (NCER). The NCER had already been anticipated by early reform work conducted in 1928 by Ben Darrow at Ohio State University.<sup>53</sup> Darrow had written a survey that pointed to radio as a classroom extension tool. Prompted by Darrow's work, Ohio Director of Education John Clifton green-lit a state-wide trial, which piqued the interest of Francis Payne Bolton of the Payne Fund, who paid for the trial's early expenses.<sup>54</sup> Bolton was subsequently encouraged to invest in noncommercial media advocacy after attending Wilbur's meeting with the Carnegie Corporation and J.C. Penney.<sup>55</sup> Through Bolton's support, the Payne Fund agreed to underwrite activism on behalf of educational broadcasters as well as interdisciplinary research in speech, psychology, sociology, political science, and education.<sup>56</sup> Cooper recommended the NCER's first major lobbyist hire: Armstrong Perry, educational radio specialist at the Office of Education.<sup>57</sup>

The NCER was instructed by Cooper to issue bulletins and "bring about legislation to permanently and exclusively assign 15% of radio frequencies, and "support research into radio education."<sup>58</sup> The NCER was further tasked to "safeguard and serve the interests" of educational stations, encourage development, and promote coordination between existing facilities. The NCER convened in 1930 with a five-year grant, at an office in the National Education Association (NEA) building in DC. In contrast to McChesney's depiction of the NCER and crucial to understanding the arc of their work before and after the Communications Act, Perry's primary responsibility was to work in extension of the Office of Education, as a third-party advocacy wing to promote plans for compulsory education. Though McChesney paints the NCER as an autonomous, intrepid activist organization, their focus on 15% set-aside frequencies came from government bureaucrats. Within the first year Perry outlined the NCER's "techniques for research" to lobby for educational radio as an "instrument as an educational tool."<sup>59</sup> Bolton appointed Joy Elmer Morgan of the National Education Association as chair of the NCER; to support Morgan, Bolton appointed Clifton and University of Wyoming President A.G. Crane.<sup>60</sup>

Armstrong Perry found early success with the 15% allocation project when he and Morgan picked up early support from Senator Simeon D. Fess of Ohio, who introduced an early bill<sup>61</sup> that cited land grants for public domain during westward expansion as a precedent for public radio allocations. As Hugh Sloten has shown in his remarkably researched work on early communication regulation, the Fess bill failed,<sup>62</sup> but an emboldened NCER stuck to the set-aside frequency strategy until the Communications Act.

#### THE COMMUNICATIONS ACT OF 1934 AND THE STRATEGIC SHIFT IN PUBLIC REFORM STRATEGY

Between 1928 and 1934, the FRC set a precedent that stations that had already streamlined technical and logistical operations most closely met the public interest mandate. At the same time, by the early 1930s multiple public institutions had envisioned a future in

which equal access to education might occur through wireless technology, yet few universities were able to emulate the professionalism or program diversity of commercial radio. As Shawn Vancour has written, performers and for-profit industries such as receiver manufacturers and department stores had quickly mastered techniques of radio aesthetics,<sup>63</sup> yet these institutions were organized to maximize profit, meaning that they were not structured to promote a public good on behalf of all audiences and listeners.

When the Communications Act of 1934 was passed, the “public interest” mandate was retained as the central logic of the bill.<sup>64</sup> The newly constituted Federal Communications Commission (FCC) was then tasked with reallocating station licenses based upon this technocratic logic, but for a much larger pool of applications than in 1927. Pursuant to the act, ACUBS and NCER sent representatives to testify on behalf of state education initiatives.<sup>65</sup> The NCER hoped to persuade the newly constituted FCC to set aside 15% as protected frequencies, and possibly as high as 25%. Senators Robert Wagner and Henry Hatfield drafted legislation on behalf of the NCER’s proposal but were defeated on the grounds that the Wagner-Hatfield “proposal needed more study.”<sup>66</sup> Once frequencies were determined in 1935, few educational stations were able to meet the FRC precedent for technical expertise, in line with the Radio Act and General Order 40 precedents, and 85% of university broadcasters lost their licenses—effectively decimating early School of the Air distance-learning experiments.<sup>67</sup>

Though McChesney paints the FCC as complicit with big business, within one year FCC Commissioners were at work mitigating the effects of the bill on universities. The one FRC member to migrate to the new FCC was Judge E.O. Sykes, the most education-friendly member of the original FRC ruling commission.<sup>68</sup> Subsequent to the act, Sykes issued a pursuant as FCC chairman that advised educational stations to take seriously the Office of Education’s suggestion that universities learn the craft of radio practice, in order to transition from educational radio’s experimental phase into a professional enterprise, while maintaining fidelity to its nonprofit mission.<sup>69</sup> His report was widely influential not only upon educational stations but also upon the course that the NCER and NACRE would take after passage of the Communications Act. Sykes began to work with new Office of Education Commissioner John Studebaker on the question of expanded access to education through radio, and together they invited the Rockefeller Foundation to help educators explore evaluative measures to standardize best practices through a new Federal Radio Education Committee (FREC).<sup>70</sup>

#### **THE FEDERAL RADIO EDUCATION COMMITTEE AND THE POLITICAL ECONOMIC STRUCTURE FOR EARLY MEDIA ACTIVISM**

In the conclusion of his pursuant, Sykes wrote that it would be fruitful to revisit Commissioner Cooper’s previous model of holding a conference to promote mutual cooperation, to “combine the educational experience of educators with program technique of broadcasters, thereby better to serve the public interest.”<sup>71</sup> Government agencies were not allowed to favor one third-party institution over another. After eight years of broadcasting license review, Sykes was resolute that educational stations needed to produce quality

programming that would attract audiences before any special provisions might be provided, or so that universities could earn the same standard assignments of commercial stations without repurposing the logic of assignments. On this he wrote: “The Commission intends actively to encourage the best minds among broadcasters and educators alike in order to develop a satisfactory technique for presenting educational programs in an attractive manner to the radio listener.”<sup>72</sup> FREC was founded (1) to establish a middle ground that every stakeholder could agree upon as grounds for frequency allocations, and (2) to locate a means by which educational broadcasting might improve and receive special frequencies.<sup>73</sup>

FREC was organized in a similar vein to the NACRE, to represent and communicate with any organization with “conceivable interest” on the question of educational broadcasting. The original NACRE board consisted of only seven members and served mainly as a platform for Levering Tyson to meet and greet academic interests, including Walter Lippman, John Dewey, and the commercial networks themselves, on behalf of Carnegie’s philanthropic work. Prior to 1934 Tyson had been dismissed by NCER activists as too concessionary to manufacturers and not dedicated enough to their nonprofit mission, a refrain also picked up in McChesney’s work. Yet Tyson enjoyed more access to political and regulatory discourses than his peers, and he had warned educational stations for years that commercial stations were primed to take over the airwaves. As early as 1931 he wrote to educators that they needed to “advance from a state of isolation,” but his recommendations went unheeded.<sup>74</sup> After the Communications Act the NACRE’s approach to the issue was the only remaining resource that the FCC and OOE could call upon to navigate a newly privatized media landscape.

Like the NCER, Tyson was hopeful that educators might still obtain set-aside frequencies, even after the Communications Act. Before FREC’s 1936 conference, Tyson applied for and received a \$7,000 grant from the Rockefeller General Education Board to hold a pre-conference with the FCC on whether 15% was still a viable proposal, and if protected frequency regulation could meet the mandate of “mutual cooperation” declared in Sykes’s pursuant (307).<sup>75</sup> New York University Chancellor H.W. Chase reported on April 2, 1935, that participants agreed that “active cooperation between the industry and educational forces in the country” would be a “milestone”; the conference identified some of the “techniques” that needed to be examined by both educators and networks, which, he believed, served as common ground between each interest.<sup>76</sup> When the FREC came to a 16-point research program to examine this question in 1936, Tyson was appointed to oversee the project. His fidelity to the original 1929 and 1930 meetings endeared him to Studebaker, who was new to the debate and entered the landscape forced to engage a commercial-friendly playing field.<sup>77</sup>

FREC named its overseeing research cooperative the “Committee of Six.” The committee was composed of half commercial and half educational representatives—John Royal of NBC, Frederic Willis of CBS, James Baldwin of the National Association of Broadcasters (NAB), W.W. Charters of Ohio State University, Hadley Cantril of Princeton University, and Levering Tyson. They framed their goal as answering “certain questions of basic interest to both educators and broadcasters” through systematic

investigation.<sup>78</sup> To fund the projects, Tyson helped put FREC into conversation with the Rockefeller Foundation. Noting that the federal government had not set aside funds for the specific technocratic purpose of improving what amounted to a cultural endeavor, the Rockefeller Foundation was invited to help “take stock and to determine what can be done.”<sup>79</sup> Tyson’s influence was a major factor in the Rockefeller Foundation’s willingness to fund educational broadcasting research and experimentation so broadly between 1934 and 1942. He helped to persuade the foundation that a “fundamental organization” could provide a “clearing house of information” about “educational undertakings” and could advise local councils in broadcasting and “enlist any interested agency that was available.”<sup>80</sup> After the act, advocates had little choice but to interact with networks, and the networks had much to teach educators about utilization of the technology.

The Rockefeller Foundation appointed John Marshall to oversee grant review for FREC projects. As works by Gary,<sup>81</sup> Buxton,<sup>82</sup> and Tobias<sup>83</sup> have noted, Marshall’s participation with FREC would inspire new directions in broadcast policy, media research, and noncommercial media practice. FREC’s Second National Conference on Educational Broadcasting began to anticipate educational broadcast’s evolution into public media in 1937. Participants concluded that an institution should be formed to (1) provide a national forum where interests concerned with education could exchange ideas, (2) examine and appraise the situation of broadcasting for future public service, (3) appraise listeners’ interest in programs that come under general classification of public service broadcasting, (4) examine the present and potential resources of education through radio, (5) examine and appraise the interest of organized education in broadcasting, and (6) bring to a large audience findings that become available from studies and research conducted.<sup>84</sup> Due to Tyson’s advisement, John Marshall agreed to fund non-commercial media projects, as long as they exhibited association with multiple associations and state support.

As David Goodman has noted, Rockefeller Foundation trustees anticipated several outcomes for FREC-related research: (1) practical determination of ways in which broadcasting can be educationally and culturally effective, (2) recruitment and practical training of personnel with requisite educational and cultural qualifications, and (3) development of interest in educational and cultural broadcasting on the part of cooperating agencies.<sup>85</sup> To secure funding from the Rockefeller Foundation between 1934 and 1940, the Office of Education and FCC’s mandate for “cooperation” became the guiding principle of grant obtainment. FREC’s reasoning was, as Marshall wrote, that Rockefeller funds would eventually “dry up”<sup>86</sup> by the end of the decade, so the foundation endeavored to jump-start projects that would be able to sustain themselves past an initial grant.

Tyson accurately pointed to the University of Wisconsin and Ohio State as the strongest experiments pre-Communications Act, resulting in two major grants going to NAEB-connected stations. Over this time Tyson encouraged NAEB-connected practitioners to streamline their practices in concert with developments in underwriting, regulation, and broad research discussions at FREC.<sup>87</sup> FREC’s partnership with the Rockefeller Foundation represented the first opportunity for national noncommercial

media growth. This would be the only way, Tyson wrote, for educators to sustain their original vision while staying on the air:

As long ago as 1921 enormous hopes were voiced that the then entire new phenomenon of broadcasting would revolutionize American education. Radio has become more powerful and more generally available. Radio has its uses and liabilities with difficulties pedagogically. Radio reaches many objects and audiences with enormous implications. Educators have lagged behind in developing uses for the new device, and the demagogue and the propagandist has seized it for his own.<sup>88</sup>

In a 1936 piece titled “What Is Educational Broadcasting? An Urgent Need,” Tyson wrote to the ACUBS—which had recently changed its name to the National Association of Educational Broadcasters (NAEB)—that when educational broadcasting was first imagined as “for programs for the school extension, it is erroneously considered boring.”<sup>89</sup> Thanks to the act, “salesmen” were “currently in charge,” so the NAEB model could become sustainable if they emphasized technical, aesthetic, and public relations work, as a constitutive component of their educational vision. The NAEB would slowly take up Tyson’s recommendations over the next 15 years. Tyson resigned from the Committee of Six to become the president of Muhlenberg College in 1937, but the projects that he inducted immediately after the Communications Act deeply influenced post-act media reform strategy. Wisconsin and Ohio State were the first NAEB-affiliated universities to obtain funds from the Rockefeller Foundation, to study the effects of listening upon learning. However, the most impactful project made possible by Tyson’s work would stem from an application submitted by the NCER’s A.G. Crane.

#### **FROM ACTIVISTS TO PUBLIC MEDIA ADVOCATES, THE NCER’S ROCKY MOUNTAIN RADIO COUNCIL**

In the immediate aftermath of the Communications Act, media reformers were left at a crossroads. After 1934 the NCER and NACRE could either continue with their original charges of political and institutional lobbying, or develop new strategies to address deficiencies in educational broadcasting. Before the act the NCER staff consisted of, at most, a dozen researchers, practitioners, and activists.<sup>90</sup> After the act the NCER initially held out hope that they might continue with Cooper’s vision for set-aside frequencies. However, this plan was brought to a halt when it was revealed that ACUBS representatives were offered—and rejected—frequencies for a new 1500–1600 AM bandwidth, due to concern that radio receivers were not yet equipped to tune in to those signals.<sup>91</sup> Once it was revealed that reserved channel lobby strategy was not only defeated in the act, but that it had been inadvertently undermined by university practitioners, Joy Elmer Morgan and Armstrong Perry left the NCER.<sup>92</sup>

Though Perry left the NCER, his work inspired reform work to stick to the nonprofit vision of educational radio discourses of the 1920s. In 1931 Perry and NCER researcher Tracy Tyler worked with ACUBS members on their mission statement. Before the act they believed that since the business world’s profit motive would promote a false

conception about the “function of broadcasting systems,” it had to be countered with a vision for public access and public good over short-term profits. After the act the NCER team grew despondent about the prospect of achieving a nonprofit system. Tyler wrote that the FCC had acted “essentially as a straddle, a defense for killing time while commercial interests become more firmly entrenched.”<sup>93</sup> Universities almost uniformly lacked the funding of commercial-quality stations, but Tyler argued that the NAEB should not “give in and embrace a commercial model” but should fight back to secure licenses by retaining an attorney, and through the development of data that might support new education-friendly regulation.<sup>94</sup>

In 1935 Bolton appointed A.G. Crane and Payne Fund administrator Howard Evans as new co-chairs of the NCER. Evans made several adjustments to the NCER’s central office. After reviewing Morgan’s pre-1934 lobby strategies, Evans concluded that the set-aside frequency strategy had already failed due to both lack of coordination with the ACUBS and lack of data to support protected assignments.<sup>95</sup> Crane and Evans believed that the public interest mandate had to be reinterpreted by universities and public agencies, or face a situation in which “histories of radio control” would become “so entrenched that there is no possibility of successfully challenging them.”<sup>96</sup> Instead of lobbying Congress to set aside protected frequencies, they decided that the NCER would “proceed forthwith to assume leadership and cooperation with the industry in order to set up standards of performance which can be utilized by all as a yardstick.”<sup>97</sup> In his communications with the NAEB after passage of the act, Evans recommended that educators build their own clear channel and provide cross-state broadcasts at a central university such as Ohio State. Evans also suggested that educators request “high band” frequencies offered by the FRC before the act, which still were not in use, to conduct relay broadcasts between stations.<sup>98</sup>

Co-chair A.G. Crane concurred with Evans’s recommendations that the mission of the next phase of the NCER should be to assist in the promotion and protection of educational broadcasters and to encourage and monitor the growth of educational stations, and he conceived of an additional step. He believed that a continued investment in noncommercial media as a “service of democracy”<sup>99</sup> would hold the early reform movement together. Since private media tended to “bar minority access and representation from the air,” due to the “relative size” of minority populations,<sup>100</sup> Crane remained determined that noncommercial media could be differentiated from not only commercial broadcasters but also from third-party educational groups, due to its intention to serve every type of audience regardless of size.

In 1936 Crane ambitiously set out to build a sustainable alternative to commercial broadcasting that equally met Sykes’s pursuit and the philosophy of noncommercial media. Crane listened closely to FREC’s recommendations. It was not enough to lecture into a mic, he concluded; listeners must feel as though they were tuning in to a service “vital yet subordinate and incidental to consciousness.”<sup>101</sup> Educational broadcasters had failed to appeal to their “unseen audience,” and the key to their survival would be to devise a plan to “conserve radio for public services” among national, regional, and state boards. Crane announced that he would develop an alternative network called the Rocky Mountain Radio Council (RMRC). The RMRC was based at the University of Wyoming and

had offices in Denver. In correspondence Crane repeatedly referred to his service as “public radio,” a “public broadcasting service,” and “public broadcasting,” setting the first coinage of the term in American media.<sup>102</sup> Through the NCER, Studebaker, the University of Wyoming, and the Rockefeller Foundation, Crane set about developing the first sustainable media infrastructure for educators. His service would meet the public interest mandate of the Communications Act but would broadcast in service of regional listeners.

John Marshall had funded a similar educational network in 1936 called the University Broadcasting Council of Chicago (UBC), which connected the University of Chicago to Northwestern and DePaul universities. The UBC made great strides examining educational broadcasting practices in the years directly following the act, but in spite of the creation of one hit show—the University of Chicago Roundtable—the project could not retain the support of its supervisors, Robert Hutchins and William Benton. In 1937 Crane proposed that his project would be similar to the University Broadcast Council, but for the Rocky Mountain region.<sup>103</sup> Crane envisioned a wider scope for broadcasting than a single city and proposed a multi-state consortium centered in Colorado and Wyoming, in which widely separated populations would gain access to public education, regardless of location. He noted that the UBC had served a small but populous area and hoped that the RMRC might extend the same concept to a wider, less populous, mountainous region.

In his first correspondences with Crane, Marshall recorded that Crane complained that he had been “omitted” from FREC meetings due to his affiliation with the NCER. That NCER-connected projects were unable to secure initial support was even more curious to Crane, since he had built his RMRC proposal on FREC recommendations, and due to “the feasibility of state-wide or regional organization for educational broadcasting.”<sup>104</sup> But Marshall’s diaries do not support Crane’s concerns. Marshall’s response to an April 1937 discussion with Crane posited that the RMRC application was too ambitious and not practical enough to implement for such a wide audience, as no technical infrastructure had yet been built, and commercial telephone wire rentals were few and far between in that area. He denied that application, writing: “Crane tended to assume that educators are already prepared for effective work in broadcasting.”<sup>105</sup> However, over the next six months Crane followed FREC suggestions and built partnerships with regional organizations. This persuaded Marshall. The allure of funding an educational project with the support of public land-grant universities was too interesting to pass up. It was an ambitious initiative. The final application proposed a radius of broadcasts that would cover Colorado and Wyoming and parts of Nebraska, Kansas, and New Mexico.<sup>106</sup> Indeed, Crane had already begun plans for the RMRC without FREC support. He had limited but stable finances at the University of Wyoming and a working relationship with Colorado’s educational institutions.<sup>107</sup>

Marshall was impressed that Crane had secured the interest of “about 30 organizations active in the area,” which Marshall felt “stimulated the feeling of local broadcasters that some such organization of this kind is in order.”<sup>108</sup> While Crane’s initial plan was “closely analogous” to the UBC, in that it proposed a central production agency responsible for producing and airing broadcasts over local stations,<sup>109</sup> by February 1939 Crane had

enlisted every Colorado state university and local adult education group, parents' and teachers' organization, women's club, medical society, public library, school of theology, farmers' cooperative, and most significantly the Wyoming Department of Education. Early program experiments included titles such as "Makers of the West," "The Story of Regional Products: Sugar Beets," "What Is a University?" and "Dude Ranching," as well as programming on history, geography, English literature, language, astronomy, music, vocational guidance, botany, art, health, and geology. Crane was so successful at building an inter-institutional collaborative framework that by 1939 Howard Evans pointed to the RMRC as the principle NCER project.<sup>110</sup>

Crane wrote that he hoped the RMRC would influence the NAEB to join media reform work by demonstrating "best practices in teaching," including strong preparation in advance and follow-up monitoring of effectiveness.<sup>111</sup> In part due to Crane's influence, the NAEB began to recommend best practices for affiliated institutions, such as rehearsals for each broadcast. "This means forty rehearsals or equivalent attention in script editing, program planning, for twenty unit broadcasts per day," Crane wrote to Marshall.<sup>112</sup> He hired broadcast announcers from local commercial stations as announcers, and additionally as educators who might train younger DJs in on-air methods. Crane continued in another letter to Marshall: "Our program for training local and institutional broadcasters is vitally dependent on recording studios which we hope will eventually be established in each of the major institutions or communities. In the establishment of these local recording studios we shall need expert advice and counsel or there will be many mistakes or money wasted."<sup>113</sup>

Between 1935 and 1937 the NCER transformed from a federal and philanthropically motivated *activist* project to what might be called a reform *advocacy* that advanced FREC's recommendations to institutionalize best practices in line with the FCC pursuant. Crane worked to streamline every aspect of educational broadcasting practice between 1937 and 1940. He instituted "Listening Schools" equipped with facilities, technology, teachers qualified to stimulate discussion around broadcasts, and textbooks, and the schools gave consideration to "social and economic backgrounds of the community." Listening Schools further provided teachers and superintendents an opportunity to consult with RMRC officials for classroom scheduling, to make sure that schools had satisfactory receivers and listening facilities, and to submit instructions for preparation of program reception. By 1940 teachers were provided with time to offer suggestions, and the RMRC produced periodic reports regarding the quality and usefulness of each program. And to ensure programs remained at a similar caliber, "central radio workshops" were set up to train staff.

Between 1937 and 1940 Crane and Marshall developed a rapport, and the Rockefeller Foundation provided reliable funds for the RMRC to "mobilize resources accordingly."<sup>114</sup> The project thrived on a mix of professionals and volunteers and on continuous training and continuity between practitioner and broadcast. It was so expensive to phone between remote sites at the time that to maintain continuity, the project instituted travel between institutions as "personal contacts and acquaintances with stations."<sup>115</sup> Crane required continuous funds in the tens of thousands just to support travel, phone calls, and labor alone. Crane's grant applications stated three goals: (1) to create a working organization

through which educational institutions and agencies, service departments, and citizens groups could mobilize and coordinate broadcasting resources; (2) to demonstrate the emphasis and value of radio as an instrument of democracy; (3) to demonstrate a cooperative method of maintaining working relationships between broadcasting stations and the producers of noncommercial programs. An additional goal was to provide a “wider range of choice” in the area in line with public interest stipulations.<sup>116</sup>

Before agreeing to a last round of funding, Marshall persuaded Crane to hire Robert Hudson of the Adult Education Council of Denver to help monitor the quality of programming.<sup>117</sup> Hudson was attached because he had written evaluations for the Rockefeller Foundation, and he had professional radio experience. According to Crane, Hudson “adjusted to the work of class instruction easily.”<sup>118</sup> But at least initially, Hudson was not optimistic that the RMRC could achieve its goals within the duration of the grant.<sup>119</sup> When Hudson’s negative review arrived, Marshall temporarily cut off funding for the project. Marshall wrote: “I gather from some remarks that he (Crane) has not yet appreciated the full force of this argument. He feels it inevitable, for example, that information will come from the centers.”<sup>120</sup>

Crane appealed to Marshall for a smaller grant of \$5,000 for continuation, by which time Marshall looked to Paul Lazarsfeld of the Princeton Radio Research Project (PRRP) for advice. Lazarsfeld examined the RMRC documents with disapproval, arguing that the RMRC seemed like little more than an organization in “the business of manufacturing educational records and induc[ing] stations to broadcast them.”<sup>121</sup> Lazarsfeld was skeptical that a centralized “network” that manufactured educational records could act as an efficient counterpoint to commercial broadcasting. However, he lauded Crane’s unusual ability to successfully coordinate the first operating educational infrastructure to include distribution and production.<sup>122</sup> That such an infrastructure could be implemented renewed Marshall’s interest, under the condition that Crane initiate new audience measurement techniques being developed by Lazarsfeld himself. Upon receiving a new wave of Rockefeller funding in 1940, Robert Hudson was appointed as full director, and he expanded services to include divisions of workshop centers in which studio auditoriums were available for educational listenership. By 1940 the RMRC had produced 32 programs in 8 continuous series, broadcast 109 times over its 13 affiliates.<sup>123</sup>

In the buildup to wartime the RMRC received support from the FCC, which anticipated a need to distribute governmental information and propaganda. Crane volunteered the RMRC to serve as a reliable informational resource for the west: “. . . our council is non partisan, non political, democratic, organized and operating in accordance with American ideas. The council’s organization, procedure, and objectives demonstrates the ideology of democracy as contrasted with the ideology of totalitarianism. I believe war times would give us better hearing in this region than would more peaceful times.”<sup>124</sup> James Fly, chairman of the FCC, congratulated the RMRC “on the occasion of its initial broadcast of the Rocky Mountain Civic Series” and its “27 educational broadcasting institutions and 17 commercial broadcasting stations coordinating commendable effort.” Fly believed the RMRC had met such stipulations and promised continued support of frequency allocations. With a coherent plan and appropriate support in place, a report

devised by Hudson and sent to John Marshall in 1940 detailed the RMRC's gradual development: "The Council plan is basically a plan for machinery to implement the project. It is a plan aiming to provide for cooperation between all elements concerned in civic broadcasting in this region."<sup>125</sup> Thirteen radio series had already been contributed by members with "eager cooperation." Crane's workshop centers were equipped with control rooms, observation rooms, studios, reception rooms, and business offices. John Studebaker recommended that regional startups look to Denver as an example, and by 1940 momentum had shifted for the NCER, and the RMRC was received as a model nonprofit network. Built based upon the recommendations of the FCC pursuant, it networked multiple collaborating organizations into one production culture and ingratiated itself to federal agencies looking for an educational broadcaster to point to as a successful experiment.<sup>126</sup>

Over this time the RMRC implemented the first organized use of transcriptions in noncommercial broadcasting, predating even the "bicycle network," U.S. public media's founding consortium.<sup>127</sup> Due to the RMRC's regional nature, placement among public land-grant institutions, and attempt to qualify educational broadcasting as "public interest" programming, Crane's term "public broadcasting"<sup>128</sup> became associated with non-commercial media. Though the first couple of years were shaky and were largely devoted to accumulating and training staff, in 1940 the council had secured active participation from 27 institutions, successfully broadcasting over 14 distinct radio stations.<sup>129</sup> By 1941 Marshall was convinced that Crane's experiment had made a contribution under Hudson's supervision. He wrote:

... the council is equipped to offer an unusual degree of leadership. Its programs already have a finish which is unusual for programs originating outside the industry. Furthermore, its offers have a well-defined program of leadership for the Council. They propose, for example, as a next step to undertake a careful appraisal of the problems of the region and to base their future program policy on that appraisal, on the assumption that such problems involve matters of direct concern to a majority of their listeners.<sup>130</sup>

Rockefeller subsequently provided a three-year grant. Robert Hudson was hired after World War II by the University of Illinois to contribute to NAEB's development of the bicycle network, and he participated in the foundational Allerton House Seminars in 1949 and 1950, helping to institutionalize best practices in educational broadcasting. Crane's work laid the foundations for Colorado Public Radio and articulated the first example of an efficient economy of scale for a noncommercial network, while transforming the strategic design of pre-New Deal media activism into a set of system- and coalition-building practices.

## CONCLUSION: HISTORIOGRAPHY AND MEDIA REFORM FROM ACTIVISM TO ADVOCACY

Looking at the arc of NACRE and NCER work between 1930 and 1940 provides scholars with a snapshot of how important a mission statement is to the development of

a media institution's economy of scale. New archival research reveals how institutional mandates of the late 1920s influenced the NCER's strategic approach to media activism, and how the committee changed their methods in response to limits and pressures set by policy, philanthropic groups, federal agencies, and public engagement. As McChesney details, the first national media reform agencies began as *activist* movements tasked with lobbying legislators to set aside protected frequencies for educators. But after 1934, I argue, the work of media activists evolved to become something more like a media *advocacy*. The paper makes these analytical distinctions less to authoritatively define these terms than to clarify the trajectory of reform work before and after the 1935 decimation of U.S. Schools of the Air. Loosely defined, the history of media activism clarified, made visible, and activated adherents around issues in media policy, representation, and access. Activism conducted by the NCER before 1934 successfully raised awareness about the issue of educational radio experiments, yet was persistently behind commercial broadcasters in seizing authority among technical debates. It was not enough to work as an extension service of the Office of Education; activists did not yet understand the technical, aesthetic, or distributive infrastructure of radio technology. In spite of early policy defeats, NCER activism made a foundational contribution to the history of the political economy of communication research by articulating the first coherent logic associated with noncommercial media. Relatedly, Armstrong Perry and Tracy Tyler made key distinctions between for-profit and nonprofit media between 1930 and 1934 that continue to resonate today. After 1934, NCER continued its philanthropically funded lobby work but also began to study and implement system-building strategies in accordance with the public interest mandate of the Communications Act. Its advocacy period consisted of expanding its alliance base; working with federal, grassroots, and state-based institutions; and implementing best practices in an alternative media system. Reform was structured to take calculated steps and implement tactical benchmarks.

This case study reveals two paths for media history research. The first is research into the temporary nature of media advocacy. I argue that the analytical difference between the study of media activism and advocacy can be framed in terms of emphasis. The goal of activism is to make a process or phenomenon conspicuous to a broader discursive construct. The goal of advocacy is to implement and organize a strategic vision so that over time a discourse no longer needs to advocate. The second path is study into alternative articulations of media institutions. Media industries begin with the for-profit logic, which structures the types of divisions, goals, and content produced by an agency or studio. Noncommercial media institutions take numerous nonindustrial forms, from public media content creation to grassroots activist groups that attempt to impose a moral vision upon how media itself is organized. Early media reform activity does not resemble a rights movement, especially taking into account the white, heteronormative, and dominant embodiment of its proponents. However, media reform history helps to inform how we understand institutional discourses that intersect with and model strategic alliances with civil rights themes, such as equal access to education. ■

## NOTES

1. Deborah Jaramillo, *The Television Code: Regulating the Screen to Safeguard the Industry* (Austin: University of Texas Press, 2018); Michele Hilmes, *Network Nations: A Transnational History of British and American Broadcasting* (New York: Routledge, 2011).
2. Julie D'Acci, *Television and the Case of Cagney and Lacey* (Chapel Hill: University of North Carolina Press, 1994); Michael Apple, "The Politics of Official Knowledge: Does a National Curriculum Make Sense?" *Discourse: Studies in the Cultural Politics of Education* 14, no. 1 (1993): 1–16.
3. David Craig, *Social Media Entertainment* (New York: NYU Press, 2019).
4. See Matthew Lasar, *Pacific Radio: The Rise of an Alternative Network*, Cambridge: Germinal Productions, 2004); Kate Moylan, *The Cultural Work of Community Radio* (London: Rowman and Littlefield, 2019).
5. See Tim Brooks, *College Radio Days: 70 Years of Student Broadcasting at Dartmouth College* (Glennville, WV: Glennville Press, 2013). Also visit RadioSurvivor.com.
6. Cynthia Meyers, *A Word from Our Sponsor: Admen, Advertising, and the Golden Age of Radio* (New York: Fordham University Press, 2013); Alexander Russo, *Points on the Dial: Golden Age Radio Beyond the Networks* (Durham, NC: Duke University Press, 2010); Neil Verma, *Theater of the Mind: Imagination, Aesthetics, and American Radio Drama* (Chicago: University of Chicago Press, 2012).
7. Dolores Ines Casillas, *Sounds of Belonging: U.S. Spanish Language Radio and Public Advocacy* (New York: NYU Press, 2014); Laura Garbes, "Sound Archive Access: Revealing Emergent Cultures," *Journal of Radio and Audio Media* 26, no. 1 (2019): 79–83.
8. David Goodman, *Radio's Civic Ambition: American Broadcasting and Democracy in the 1930s* (Oxford: Oxford University Press, 2011); Ross Melnick, *American Showman: Samuel "Roxy" Rothafel and the Birth of the Entertainment Industry, 1908–1935* (New York: Columbia University Press, 2014).
9. Janet Wasko, "Studying the Political Economy of Media and Information," *Comunicação e Sociedade* 7 (2005): 25–48.
10. Susan Douglas, *Inventing American Broadcasting*. (Baltimore: Johns Hopkins University Press, 1989); Josh Shepperd, "Infrastructure in the Air: The Office of Education and the Development of Public Broadcasting in the United States, 1934–1944," *Critical Studies in Media Communication* 31, no. 3 (2014): 230–43; Andrea Stanton, *This Is Jerusalem Calling: State Radio in Mandate Palestine* (Austin: University of Texas Press, 2013).
11. Robert Avery, *Public Service Broadcasting in a Multi Channel Environment* (New York: Longman, 1993).
12. Hugh Sloten, *Radio's Hidden Voice: The Origins of Public Broadcasting in the United States* (Urbana: University of Illinois Press, 2009).
13. Ralph Engelman, *Public Radio and Television in America: A Political History* (New York: Sage, 1996).
14. Of particular note are the collections at the Wisconsin Historical Society, Wisconsin Center for Film and Theater Research, and the University of Maryland Special Collections in Mass Media and Culture.
15. Ira Wagman, "Locating UNESCO in Histories of Communication Study," in *The International History of Communication Study*, ed. Peter Simonson and David Park (New York: Routledge 2015), 71–90.
16. John Studebaker to Stacy May, October 3, 1936, Rockefeller Archive Center, box 332, folder 3950.
17. Richard Hull to E.W. Ziebarth, January 7, 1948, Wisconsin Historical Society, National Association of Educational Broadcaster Papers, box 4, folder 5.

18. Nabil Echchaibi, *Voicing Diasporas: Ethnic Radio in Paris and Berlin in Between Culture and Renewal* (Lanham, MD: Lexington Books, 2011).
19. Robert McChesney, *Telecommunications, Mass Media, and Democracy: The Battle for Control of US Broadcasting, 1928–1935* (New York: Oxford University Press, 1995).
20. Victor Pickard, “The Battle Over the FCC Blue Book: Determining the Role of Broadcast Media in a Democratic Society, 1945–1948,” *Media, Culture, and Society* 33, no. 2 (2011): 171–191.
21. See Michele Hilmes, *Network Nations: A Transnational History of British and American Broadcasting* (New York: Routledge, 2011).
22. David Morely and Kevin Robins, *Spaces of Identity: Global Media, Electronic Landscapes, and Cultural Boundaries* (London: Routledge, 1996).
23. Katie Day Good, *Bring the World to the Child: Technologies of Global Citizens in American Education* (Cambridge, MA: MIT Press, 2020); Heidi J.S. Tworek, “The Savior of the Nation? Regulating Radio in the Interwar Period,” *Journal of Policy History* 27, no. 3 (2015): 465–91.
24. Allison Perlman, *Public Interests: Media Advocacy and Struggles over U.S. Television* (New Brunswick, NJ: Rutgers University Press, 2016).
25. Victor Pickard, *America’s Battle for Media Democracy: The Triumph of Corporate Libertarianism and the Future of Media Reform* (Cambridge: Cambridge University Press, 2015).
26. David Goodman, *Radio’s Civic Ambition* (Oxford: Oxford University Press, 2011).
27. B.B. Brackett to J.W. Stafford, August or September, 1934, NAEB Files, box 1, folder 1934.
28. M. LaFollette, *Science on the Air: Popularizers and Personalities on Radio and Early Television* (Chicago: University of Chicago Press, 2008).
29. Good, *Bring the World to the Child*.
30. Edward J. Banas and W. Frances Emory, “History and Issues of Distance Learning,” *Public Administration Quarterly* 22, no. 3 (1998): 365–83.
31. First Constitution of Association of College and University Broadcasting Stations, 1926, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 110.
32. William Bianchi, *Schools of the Air: A History of Instructional Programs on Radio in the United States* (Jefferson, NC: McFarland, 2008).
33. William Reese, *Power and Promise of School Reform* (New York: Teacher College Press, 1980).
34. Once public extensions were created, they also tended to act as sites for democratic exchange in the form of town hall meetings, which Reese describes as “social centers.”
35. Timothy Shaffer, *Deliberative Pedagogy: Teaching and Learning for Democratic Engagement* (East Lansing: Michigan State University Press, 2017).
36. B.B. Brackett, internal correspondence from Brackett to Ted Beaird, March 1, 1932, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 1.
37. Tracy Tyler, on the NCER to the NAEB, May 24, 1929, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 1.
38. F.H. Lumley to NAEB, “The Needs of Educational Broadcasting,” 1932, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 19.
39. Tracy Tyler, letter to Herman James, 1932, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 19.
40. Morse Salisbury, chief of Radio Service at U.S. Department of Agriculture, “Educational Broadcasting, 1928–1933,” Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 19.
41. Bess Goodykoontz, letter to NAEB, December 17, 1931, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 19.

42. Joseph Wright, internal memo, 1931, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 19.
43. Tracy Tyler to Joseph Wright, January 9, 1933, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 19.
44. Douglas, *Inventing American Broadcasting*.
45. Slotten, *Radio's Hidden Voice*.
46. David Moss and Jonathan Lackow, "Capturing History: The Case of the Federal Radio Commission in 1927" ch. 8 in *Preventing Regulatory Capture: Special Interest Influence and How to Limit It*, ed. Daniel Carpenter and David Moss (Cambridge: Cambridge University Press, 2013).
47. Philip Sewell, *Television in the Age of Radio: Money, Imagination, and the Making of a Medium* (New Brunswick, NJ: Rutgers University Press, 2014).
48. Susan Smulyan, *Selling Radio: The Commercialization of American Broadcasting, 1920–1934* (Washington, DC: Smithsonian Institution Press, 1994).
49. Unsigned, but likely Paul Lazarsfeld, "What the Industry Knows," internal document, April 26, 1937, Rockefeller Foundation, box 271, folder 3234.
50. NAEB Bulletin, February 20, 1931, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 101.
51. Report of the Secretary of the Interior, February 15, 1930, National Archives I.
52. Levering Tyson to Neville Miller, December 10, 1938, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 104, folder 4.
53. For more on Darrow, see his book *Radio: The Assistant Teacher* (Columbus, OH: R.G. Adams & Co., 1932).
54. Edgar Dale, report, December 5, 1938, Keith Tyler Papers, unprocessed, accession 141–151-6.
55. Tyson (see note 52).
56. Francis Payne Bolton, letter to Franklin Dunham of RCA, October 29, 1930, Western Reserve Historical Society, Payne Fund Papers, box 69, folder 1352. Also see Brent Malin, "Mediating Emotion: Technology, Social Science, and Emotion in the Payne Fund Motion-Picture Studies," *Technology and Culture* 50, no. 2 (2009): 366–90.
57. Armstrong Perry, "Organization Set Up," memorandum, November 5, 1930, Western Reserve Historical Society, Payne Fund Papers, box 69, folder 1352.
58. NCER, "Memorandum Regarding Conference on Radio in Education," November 8, 1930, Western Reserve Historical Society, Payne Fund Papers, box 69, folder 1352.
59. Armstrong Perry, "Memorandum of Intention," October 24, 1930, Western Reserve Historical Society, Payne Fund Papers, box 69, folder 1352.
60. Edgar Dale, untitled history of the Payne Fund, filed December 5, 1938, Ohio State University Archives, Keith Tyler Papers, accession 141–151-6.
61. Payne Fund, record of the committee meeting, December 30, 1930, Western Reserve Historical Society, box 38, folder 743.
62. Hugh Slotten, *Radio and Television Regulation, 1920–1960* (Baltimore: Johns Hopkins Press, 2000).
63. Shawn Vancour, *Making Radio: Early Radio Production and the Rise of Modern Sound Culture* (Oxford: Oxford University Press, 2018).
64. Slotten, *Radio and Television Regulation*. Also see George Wiley, "Report Committee on Radio Education," undated, packaged with 1934 report, Rockefeller Foundation, box 360, folder 3710.
65. Joseph Wright, letter to all members, August 15, 1934, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 1.
66. H.K. Norton, internal memo to NBC reporting on Wagner-Hatfield Amendment proposal, 1933, Wisconsin Historical Society, NBC Papers, box 26, folder 27.

67. Harold Hill, *History of the National Association of Educational Broadcasters*, Wisconsin Historical Society, 1954.
68. E.O. Sykes, undated quote on Educational Broadcasting, Rockefeller Archive Center, box 358, folder 3693.
69. Report of the Federal Communications Commission to Congress Pursuant to Section 307 (c) of the Communications Act of 1934, Rockefeller Archive Center, box 360, folder 3710.
70. FREC Report, "Revised Prospectus of Original Project II in the Report of the Sub-Committee on Conflicts and Coordination," undated but probably 1936, Rockefeller Foundation Archive, box 332, folder 3951.
71. FCC Pursuant.
72. Ibid.
73. Inter-office correspondence, Studebaker office, FREC, January 12, 1937, Rockefeller Archive Center, box 332, folder 3952.
74. Levering Tyson, "Memorandum of Points Brought Out in First Annual Assembly, NACRE, Meeting 21 May 1931," Rockefeller Archive Center, box 360, folder 3709.
75. H.W. Chase to Trevor Arnett of Rockefeller Foundation General Education Board, April 2, 1935, Rockefeller Foundation, box 358, folder 3693.
76. H.W. Chase, letter to Trevor Arnett of Rockefeller Foundation General Education Board, April 2, 1935, Rockefeller Archive Center, box 358, folder 3693.
77. Levering Tyson, "A Proposal of the Establishment of a National Council on Radio in Education," Rockefeller Archive Center, box 360, folder 3709.
78. "Project I (Old Project No. 15)," internal RF report, March 12, 1937, Rockefeller Archive Center, box 332, folder 3951
79. Ibid.
80. John Marshall, "The Webster-Case Memorandum on Broadcasting and Other Related Aids to Education," November 9, 1936, Rockefeller Archive Center, box 360, folder 3709.
81. Brett Gary, *Nervous Liberals* (New York: Columbia University Press, 1999).
82. <http://www.rockarch.org/publications/resrep/buxton.pdf>.
83. <http://www.rockarch.org/publications/resrep/tobias.pdf>.
84. John Marshall, notes on second conference, June 10, 1937, Rockefeller Archive Center, box 254, folder 3035.
85. Confidential internal report, "Radio in RF and GEB Program: Retrospect and Prospect," June 1937, Rockefeller Archive Center, box 358, folder 3693.
86. John Marshall diaries, internal memo, August 31, 1938, Rockefeller Archive Center, box 5, folder 50.
87. Levering Tyson, letter to NAEB, 1933, untitled and undated, NAEB Papers, box 101.
88. Levering Tyson, "Educational News Bulletin from Western State Teacher's College," October, volume 6, #1, 1936, NAEB Papers, box 101.
89. Levering Tyson, "What Is Educational Broadcasting? An Urgent Need," 1936, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 101.
90. See David Haus, "Expertise at War: The National Committee on Education by Radio, the National Association of Broadcasters, the Federal Radio Commission, and the Battle for American Radio" (PhD diss., Bowling Green State University, 2006).
91. Letter from Joseph Wright to James H. Hanley at the Federal Radio Commission, August or September 1934, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 1, folder 1934.
92. Dale, Payne Fund (see note 60).
93. Tracy Tyler, letter to NAEB, Feb 18, 1935, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 1.
94. Ibid.

95. Howard Evans to Gertrude Warren, February 19, 1935, Payne Fund Papers, Western Reserve Historical Society, box 38, folder 722.
96. Howard Evans, letter to Carl Menzer, February 18, 1938, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 2, folder 3.
97. *Ibid.*, document written with Herman Hettinger, attached to an FCC report.
98. Howard Evans, "Toward a More Democratic Radio," 1939, NAEB Papers, box 2, folder 4.
99. A.G. Crane, proposal for "Supplemental Broadcasting System," September 9, 1935, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 101.
100. *Ibid.*
101. A.G. Crane, "Selling Radio to College Authorities," note to NAEB, 1936, Wisconsin Historical Society, National Association of Educational Broadcasters Papers, box 101.
102. A.G. Crane, preliminary prospectus for a Rocky Mountain Public Radio Service, April 29, 1937, Rockefeller Archive Center, box 279, folder 3320.
103. *Ibid.*
104. John Marshall diaries, interview with A.G. Crane. April 13, 1937, Rockefeller Archive Center, box 277, folder 3307.
105. *Ibid.*
106. Rocky Mountain Radio Council, "A Need Discovered," undated, probably 1939 or 1940, Rockefeller Archive Center, box 278.
107. John Marshall diaries, from a conversation with Crane at the Institute on Education by Radio, Columbus, May 3–5, 1937, Rockefeller Archive Center, box 277, folder 3307.
108. *Ibid.*
109. *Ibid.*
110. A.G. Crane, letter to John Marshall, August 13, 1938, Rockefeller Archive Center, box 277, folder 3307.
111. *Ibid.*
112. *Ibid.*
113. A.G. Crane, letter to Marshall, August 20 1938, Rockefeller Archive Center, box 277, folder 3308.
114. Rocky Mountain Radio Council, "Rocky Mountain Radio Project: A Plan for Cooperative, Regional, Broadcasting in Public Interest," July 22, 1939, Rockefeller Archive Center, box 278, folder 3310.
115. Rocky Mountain Radio Council, "Program Preparatory to Opening of Rocky Mountain Public Radio Program," May 22, 1939, Rockefeller Archive Center, box 277, folder 3308.
116. Rocky Mountain Radio Council, "Rocky Mountain Radio Project: A Plan for Cooperative, Regional, Broadcasting in Public Interest," July 22, 1939, Rockefeller Archive Center, box 277, folder 8.
117. A.G. Crane, letter to John Marshall, May 22, 1939, Rockefeller Archive Center, box 277, folder 3308.
118. A.G. Crane, letter to John Marshall, July 22, 1939, Rockefeller Archive Center, box 278, folder 3310.
119. Robert Hudson, letter to John Marshall, July 25, 1939, Rockefeller Archive Center, box 278, folder 3310.
120. John Marshall diaries, September 15, 1939, Rockefeller Archive Center, box 278, folder 3310.
121. Paul Lazarsfeld, letter to John Marshall, February 26, 1940, Rockefeller Archive Center, box 277, folder 3307.
122. *Ibid.*
123. Robert Hudson, letter to John Marshall, March 4, 1940, Rockefeller Archive Center, box 278, folder 3311.

124. A.G. Crane, letter to John Marshall, September 25, 1939, Rockefeller Archive Center, box 278, folder 3311.
125. Rocky Mountain Radio Council, "First Four Months of Operations, 1 November 1939–February 29, 1940," Rockefeller Archive Center, box 278, folder 3312.
126. Ibid.
127. A.G. Crane, letter to John Marshall, July 22, 1939, Rockefeller Archive Center, box 277, folder 3308.
128. John Marshal diaries, November 20, 1937, Rockefeller Archive Center, box 360, folder 3712.
129. Reported in April 1941 Application for Renewal Funds, Rockefeller Archive Center, box 278, folder 3315.
130. Ibid.