Book review

The Political Spectrum: The Tumultuous Liberation of Wireless Technology, from Herbert Hoover to the Smartphone Edited by Thomas W. Hazlett Yale University Press New Haven, CT, USA 2017 pp. 416 \$35.00 Review DOI 10.1108/DPRG-09-2017-0048

rofessor Hazlett offers us the most amusing contribution to understanding the American political and economic scene for the broadcast, cable, satellite TV and telecommunications industries, much of it through the lens of radio spectrum management. It is of course his own, quite individual, point of view, very much from the American libertarian position in the *political* spectrum.

What comes across most strongly from this interesting mix is that the radio spectrum in the USA since the 1920s has been a key component of the American political scene, not just of the economy and social structure. Moreover, since the 1920s, political power has been increasingly expressed through control of the radio spectrum and through its regulatory mechanisms that are now an intrinsic part of US politics. A former Chief Economist of the Federal Communications Commission (FCC), Hazlett provides us with an appropriate tome for these trumped-up days of distortion and disunity, platformed on instant messaging (vouning intended). All is exposed with a strong sense of humour, a waspish attention to detail and perhaps somewhat selective sources, as befits Hazlett's approach, often taking the Milton Friedman perspective – i.e. markets in spectrum must always be the solution to their allotment.

Professor Hazlett's main theme is that the radio spectrum is a valuable economic asset and, therefore, is subject to political-economic forces seeking to gain control of that asset. But there is also a deeper and more grasping relationship: the radio spectrum controls politics in the USA, as it is the access gateway to media diffusion and therefore to political campaigns and propaganda. Interestingly, he points out that the US administration has traditionally controlled the broadcasters' political bias but left the newspaper proprietors alone because the US Constitution was framed before radio, cable TV, satellite and broadcast TV existed.

Throughout, we are given a riveting ride through the radio spectrum's wicked regulatory history and its politics, with the escapades and the politicians - and especially the inner recesses of that mysterious regulatory monster, the FCC, all from a libertarian viewpoint. Note that in the USA, it is the National Telecommunications and Information Administration that rules on "Federal" or government spectrum, e.g. for naval radars, even in the centre of the country. The historical chapters are packed with detail, shocking anecdotes of legendary malfeasance, horrendous inside deals and obvious long-term disasters carefully followed through by the US administration, especially the FCC. I was not aware, for instance, that for many years, Lyndon Johnson effectively controlled the FCC through his protection of its budget appropriations. And, certainly, I did not realise that he seems to have had influence over the award of

licences for radio and TV stations, including to himself, although these were always taken in his wife's name, Lady Bird, much to the benefit of the family's fortunes.

Hazlett is most entertaining when examining the creation of the big three VHF TV broadcasters from the 1950s onwards, assiduously protected from new UHF stations and cable TV. The FCC decisions in its effectively political struggles with cable TV entrants are well-documented. When finally permitted, cable took off over a single decade: 1978-1988. That tight control over spectrum to protect the three incumbent giants is contrasted with the entry of mobile cellular communications from the 1990s. They were given a much more liberal regulatory ride by the FCC. MNOs obtained far greater technical and service freedoms over the spectrum awarded, in spite of it being fairly miserly until the PCS auctions. The very introduction of the auction process was then considered radical.

Viewed from the outside, to me, the US market often seemed fairly illogical, possibly biased towards incumbents and with some contentious regulatory decisions, good - but I certainly did not imagine it to be this random or with this much protection of vested interests. The book explores why the FCC has often seemed strangely oriented or powerless, especially when challenged in court. Only the country that could build the largest and strongest monopoly in the telecommunications industry, dismember it, and then allow it to rebuild itself as an oligopoly in less than a decade, could be subject to such an intricate political fray. The problems of the solemn concentration of oligopolistic power in the US telecommunications and broadcasting industry from the

1920s to the 1980s, and beyond, are laid at the door of the FCC. But fault must also lie with the government legislators and the opposition manipulators behind many decisions. After all, the FCC is just an agency of the US Congress.

Whether you always agree with Hazlett or not, he is revealing on both sides of the political spectrum. Political machinations of both the left and right in the Senate, Congress and the White House are treated to detailed exposés of their manipulation of the award of licences and broadcasting laws, such as the right to reply to paid-for political radio campaigns. Spectrum allotment is always a key part of this - as in the case given in the book of the C-Block embarrassment for the FCC. But Hazlett also attacks the concentration of market power through spectrum, so there is more here than Trumpian economics.

Hence, this is a useful book at several levels - social and economic as well as insights into its own political position. For instance, it assiduously discusses the American landscape of technology politics in the realms of the murky fixes over spectrum allocations, not to so much to control broadcast and telecommunications markets, but more to promote specific political positions. Technology is just a toy for the major industry players (and the politicians who rarely understand it) with which to oppose each other, as it may be stymied for years and then passed to the least deserving (as in the case given of the Northpoint fiasco). And the FCC, like most NRAs, lags behind in understanding technology progress, such as the Internet, and its real market significance.

Hazlett also tries to explore where, when and how the analogy of spectrum with property, (specifically land) breaks down, as put forward by Ronald Coase in 1959. Does the whole rights-to-ownership model of spectrum collapse? But what should replace it is not clearly defined really.

Generally, the book is on less sure ground on the value of spectrum, a notoriously difficult subject, and also the place of licence–exempt spectrum. Instead, the preferred mechanism, here is auctions for licence fees at the highest rates, implying that network building will inevitably follow. Being free to innovate with no hindrance in paying for spectrum licences is not favoured. Thus, the treatment of Wi-Fi as a driver of the US economy is treated as less of a success than it may actually deserve.

Since its formation in 1934, following the "restrictive regime" for spectrum of the1927 Radio Act, the problematic constitution, decisions and operations of the FCC have been endlessly debated. Successive conscientious officials have left it, publishing valedictory memorandums with stinging condemnations of the bureaucracy and bleak failures to manage spectrum for the people, not just for the industry incumbents. In the final chapters, Hazlett considers its future - should it, and will it, continue at all? - although it is unclear what Hazlett proposes. I suspect the FCC is too convenient a tool for influence over media, the new internet economy and money gathering for the state for the Congress to forsake it, despite the byzantine history of misrule detailed here. Just how the FCC, or a successor, should face the challenges of a far more complex Twenty First Century regulatory landscape for spectrum is the key unanswered question - perhaps the next book?

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