

Data Mining Methods for Assessing Public Attitudes of CCS

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This case study illustrates how data mining methods can be used to gain significant insights into the prevailing tone and geographical patterns in the coverage of CCS and be a useful tool for energy resource managers to respond to changes in public perception. This study examined over one million global news and social media articles to characterize public attitudes towards Clean Coal with Carbon Capture and Storage (CCS). Analysis of the LexisNexis database from the origin of the term Clean Coal through the present, suggests that CCS has been intimately linked with coal-fired power plants with 50 to 75 percent of the CCS articles in any given month mentioning Clean Coal and CCS together. The term CCS generates the highest density of front page and editorial coverage of any energy-related technology of the last half-century. During the 2008 US presidential campaign, the terminology of Clean Coal with CCS was launched into the public lexicon through the work of the Hawthorne Group. The data show that the effect was limited to the news media and that the blogosphere largely did not react to this campaign-based press initiative. Further, while the number of blogs covering Clean Coal with CCS has increased 1,200% over the last four years, the overlap between the news and blogosphere has grown significantly, suggesting newer blogs are simply reinforcing the same messages, while the tone of their coverage is nearly identical to the more traditional news media. Most surprisingly, economic impact rather than threat of environmental damage appears to drive media interest. Additionally, media coverage seems to resonate most strongly with the public in spring and fall, rather than the summer.