New methods for quantifying the similarity of English accents and dialects

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This paper reports progress in applying quantitative methods to the synchronic comparison of accents and dialects of English through a technique for matching pronunciations against each other and quantifying their phonetic similarity. A new, phonetically-informed computer program compares and measures the phonetic similarity between detailed transcriptions of 100 lexical items in a number of English accents and dialects. These results are represented in networks, which show connections between varieties regardless of whether these reflect common origin, parallel innovation, or contact. With these data, we hope to investigate a range of issues, including sub-grouping, dialect levelling, and Celtic influence.