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Method Selection in Participatory Modelling: A Survey of Practitioners

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Abstract: The popularity of 'participatory modelling' (PM) approaches to environmental modelling has grown in recent years, however, there remains limited literature about how participatory modelers select from a range of a growing number of PM methods. We surveyed PM modelers to explore the factors that influence their selection of PM methods. Our survey draws on a typology that outlines five categories of PM methods: fact finding, process orchestration, qualitative modelling, semi-quantitative modelling, and quantitative modelling. Results from our survey (N=84) suggest three main findings: 1) the comfort level of respondents for a given PM method is the highest for 'fact finding' and 'process orchestration' methods but the lowest for more quantitative methods; 2) time, level of stakeholder involvement, prior experience, and money are the most important factors when selecting a method, while the least important factors are participants' skill/education level and data availability; and 3) respondents typically select methods based on the nature of the problem they are studying, yet also tend to favour methods with which they are most familiar.

Keywords: participatory modelling; method selection process