Uplift Modeling Approach to Optimizing Content Quality in Social Q/A Platforms

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Abstract : TurboTax AnswerXchange is a social Q/A system supporting users working on federal and state tax returns. Content quality and popularity in the AnswerXchange can be predicted with propensity models using attributes of the question and answer. Using uplift modeling, we identify features of questions and answers that can be modified during the question-asking and question-answering experience in order to optimize the AnswerXchange content quality. We demonstrate that adding details to the questions always results in increased question popularity that can be used to promote good quality content. Responding to close-ended questions assertively improve content quality in the AnswerXchange in 90% of cases. Answering knowledge questions with web links increases the likelihood of receiving a negative vote from 60% of the askers. Our findings provide a rationale for employing the uplift modeling approach for AnswerXchange operations.
Keywords : customer relationship management, human-machine interaction, text mining, uplift modeling