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Responding to children's mathematical thinking in the moment: an emerging framework of teaching moves.

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Summary: This case study contributes to efforts to characterize teaching that is responsive to children's mathematical thinking. We conceptualize *responsive teaching* as a type of teaching in which teachers' instructional decisions about what to pursue and how to pursue it are continually adjusted during instruction in response to children's content-specific thinking, instead of being determined in advance. Building on earlier work, we present an emerging framework of teaching moves using examples from the interactions of a highly skilled teacher who was selected because of her expertise in responsive teaching. We draw from her interactions with children around fraction story problems in both one-on-one interviews and class lessons. The framework identifies *categories of teaching moves*, rather than specific comments or questions, because how teachers enact a category depends on the situation. We discuss four major categories of teaching moves: (a) ensuring the child is making sense of the story problem, (b) exploring details of the child's existing strategy, (c) encouraging the child to consider other strategies, and (d) connecting the child's thinking to symbolic notation. Our findings also highlight both the potential usefulness of one-on-one interviews for professional developers and researchers and the need for increased attention to the part of class lessons in which teachers circulate and engage in one-on-one conversations with children.

Classification: D42 D43 C32 C33 C72 C73 F42 F43

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