Multiplication and Division with Proper Fractions

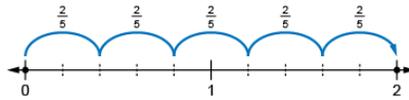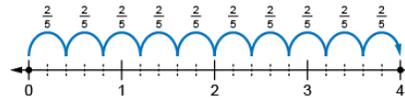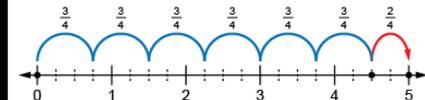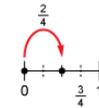| Models multiplication and division situations concretely and pictorially.	Uses models and think-addition strategies, to solve multiplication problems.	Uses models and think-addition strategies without leftovers, to solve division problems.	Flexibly solves multiplication and division problems (with and without leftovers).
$4 \times \frac{3}{5} = ?$ "I modelled the multiplication with fraction strips, then counted fifths: $4 \times \frac{3}{5} = \frac{12}{5}$, or $2\frac{2}{5}$"	$5 \times \frac{2}{5} = ?$ "I know that multiplication is like repeated addition, so I used a number with each whole partitioned into fifths, then took 5 jumps of two-fifths: $5 \times \frac{2}{5} = 2$"	$4 \div \frac{2}{5} = ?$ "I used a number line from 0 to 4 and partitioned each whole into fifths. I took jumps of two-fifths until I reached 4. I took 10 jumps. So, $4 \div \frac{2}{5} = 10$."	$5 \div \frac{3}{4} = ?$ There are 6 groups of $\frac{3}{4}$, with $\frac{2}{4}$ left over. $\frac{2}{4}$ is $\frac{2}{3}$ of $\frac{3}{4}$ So, the remainder is $\frac{2}{3}$. $5 \div \frac{3}{4} = 6\frac{2}{3}$

Observations/Documentation