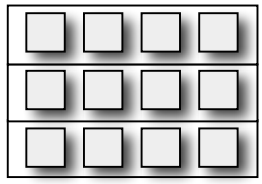
Lesson 5.1c

Arrays

Objectives	**California Standards**
• Model multiplication situations with arrays.	**NS 3.1** Use repeated addition, arrays, and counting by multiples to do multiplication. **MR 1.2** Use tools, such as manipulatives or sketches, to model problems. **MR 3.0** Students note connections between one problem and another.
Materials • Square tiles or counters that can be displayed • Number cubes 1–6 and 4–9 for each group • Connect-a-Cubes or square graph paper	**Vocabulary/Phrases** Column Row

Teaching Strategies		
Arrays	Display objects, such as squares or counters, in two equivalent rectangular arrays, or draw them on the whiteboard. Draw lines to group the objects in one array into rows, and those in the other array into columns. Point to the first group, where the array is in rows. Ask students how many rows there are (3). Ask students how many objects there are in each row (4). Ask them how many objects there are altogether (12). Write the addition equation on the whiteboard under this first group. **Note** Define rows and columns by pointing to examples in arrays you draw on the whiteboard. Some students may need more review of these terms.	 4 + 4 + 4 = 12
	Point to the second group, where the array is in columns. Ask students how many columns there are (4). Ask them how many objects there are in each column (3).