**EE.4 - Team Challenge**

Equivalent Expressions

Which of the following expressions are equivalent? Why? If an expression has no match, write 2 equivalent expressions to match it.

2(*x*+4)

8+2*x*

2*x*+4

3(*x*+4) − (4+*x*)

*x*+4

Rectangle Perimeter 2

The students in Mr. Nolan's class are writing expressions for the perimeter of a rectangle of side length ℓ and width *w*. After they share their answers, the following expressions are on the board:

Sam: 2(ℓ+*w*)

Joanna: ℓ+*w*+ℓ+*w*

Kiyo: 2ℓ+*w*

Erica: 2*w*+2ℓ



Which of the expressions are correct and how might the students have been thinking about finding the perimeter of the rectangle?