Problem of the Week Problem B Jordyn's Garden

Jordyn's neighbourhood is building a community garden to grow some vegetables. They would like the garden bed to have an area of 48 square metres, and plan to put wooden fence boards around the edges of the garden bed. To reduce the cost of the project, they would like the garden bed to have the smallest possible perimeter.

- (a) Determine the length and width of Jordyn's community garden bed. Assume the side lengths are whole numbers, in metres.
- (b) The community decided to double the area of the garden bed, but would still like it to have the smallest possible perimeter. Again, assume the side lengths are whole numbers, in metres. Determine the length and width of the garden bed now.

