Exercise 15

Match the vector fields \mathbf{F} on \mathbb{R}^3 with the plots labeled I–IV. Give reasons for your choices.

$$\mathbf{F}(x, y, z) = \mathbf{i} + 2\mathbf{j} + 3\mathbf{k}$$

Solution

This vector field corresponds with plot IV. The vectors all point upward in the same direction and have the same magnitude.

