A study has found that a common weed named “Portulaca oleracea”, commonly known as purslane, offers important clues about creating drought-tolerant crops in a world beset by climate change.

What is Purslane?
Purslane is a succulent plant that grows in many countries because it thrives in poor soil.

Note: corn and sugarcane have evolved ‘C4 photosynthesis’, which allows them to remain productive under high temperatures.

Meanwhile, cacti and agaves have evolved ‘CAM photosynthesis’, which allows them to thrive in areas with little water.

The study has found that the purslane plant integrates both these two distinct metabolic pathways namely C4 and CAM to create a novel type of photosynthesis. This allows the weed to endure drought while remaining highly productive.