Summer ozone is always bad in the south valley, but this year it's less bad

By Steven Mayer

The Bakersfield Californian, Tuesday, July 30, 2019

Weather and air quality are intimately interconnected in the San Joaquin Valley.

When summer temperatures feel like a furnace fan, and high pressure weather systems settle over the valley, air quality inevitably suffers.

But this summer, it appears the valley is seeing fewer days that exceed federal ozone standards — and Bakersfield is seeing Air Quality Index readings with more days in safer levels and fewer days in unhealthy levels.

"This is definitely a positive ongoing development," said Samir Sheikh, executive director and air pollution control officer for the San Joaquin Valley Air Pollution Control District.

"There's no doubt the reason we are seeing improved air quality in the valley portion of Kern County," Sheikh said, is because of reductions in emissions in both stationary and mobile sources of pollution that have been ongoing for years.

"On similar days with the same weather patterns, we would have seen concentrations of ozone significantly higher than we're seeing now," he said.

Evidence of this can be found in significantly reduced ozone concentrations, which 20 years ago routinely rose above 100 parts per billion. Nowhere in the valley over the past weekend, which reached 110 degrees in Bakersfield, did any location reach that very unhealthy concentration of ozone.

In 1999, for example, Bakersfield residents experienced 41 days in which the AQI reached the "unhealthy" range of 95 ppb or higher. Ten years later, in 2009, the city saw 32 days in the "unhealthy" range.

Last year, Bakersfield charted 19 days in "unhealthy." And so far this year, there's been one.

There's "zero doubt," Sheikh said, that these measurable improvements are resulting from cleaner fleets, cleaner equipment and other steps taken by commercial and industrial entities in the valley to cut emissions.

It doesn't mean the air quality is great. But it means it's better.

Tom Frantz, a clean air activist who farms 40 acres of almonds near Shafter acknowledged that ozone violations are down this year. But he gives much of the credit to the weather.

"The pattern of frequent low pressure systems passing through the area has been very beneficial in keeping ozone levels a little lower than average," he said. "The lack of stagnant air is quite helpful."

Indeed, even with the high pressure system that settled over the valley, air movement has been noticeable in the southern valley.

Ozone, and ultimately smog, is created when its precursor chemicals are cooked by the hot summer sun. But it increases in concentration when the air becomes stagnant. That's why ozone is a summer problem.

Frantz noted that Kern's air remains the worst or the second-worst in the nation, vying with the Los Angeles basin for that dubious title. Until that changes, it's hard to crow about improvements.