Scientists could produce ‘green’ beer with CRISPR-edited yeast, but consumer fear of GMOs may stand in the way

First came the IPAs and then the double IPAs, triple IPAs, and imperial IPAs….Like most hipsters, I love a good hoppy beer. So I was disappointed to learn that hops are not environmentally friendly. Fortunately, scientists are brewing up new ways to decrease the environmental footprint of a pint, though ideologies could prevent these green beers from ever making it to tap houses.

Dr. Jay Keasling is a renowned synthetic biologist with a passion for all things green.…I anxiously anticipated his keynote talk at one of the biggest synthetic biology conferences of the year. What I didn’t expect is that….Keasling talked about beer.

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[T]he floral flavor behind the very popular Cascade hops comes mainly from two terpenes: linalool and geraniol. Researchers in Keasling’s lab at the University of California at Berkeley set out to engineer the genetic pathways that produce linalool and geraniol into brewers yeast….Ultimately, they used CRISPR to introduce genes from mint and basil and tweak a few of the yeast’s own genes.

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If the hop-free hoppy beer made possible by the work in Keasling’s lab makes it to shelves, it is unclear whether it will sport a label distinguishing its unique history. It seems [brewers are] worried consumers won’t bite. People are ironically skeptical when it comes to their choice of booze, despite their acceptance of a much less benign ingredient — alcohol.

Read full, original article: A CRISPR approach to greener beer