

five contain HFCS.) Then there are all the other corn ingredients in the nugget: the binders and emulsifiers and fillers. In addition to corn sweeteners, Isaac's shake contains corn syrup solids, mono- and diglycerides, and milk from corn-fed animals. Judith's Cobb salad is also stuffed with corn, even though there's not a kernel in it: Paul Newman makes his dressing with HFCS, corn syrup, corn starch, dextrin, caramel color, and xanthan gum; the salad itself contains cheese and eggs from corn-fed animals. The salad's grilled chicken breast is injected with a "flavor solution" that contains maltodextrin, dextrose, and monosodium glutamate. Sure, there are a lot of leafy greens in Judith's salad too, but the overwhelming majority of the calories in it (and there are 500 of them, when you count the dressing) ultimately come from corn. And the French fries? You would think those are mostly potatoes. Yet since half of the 540 calories in a large order of fries come from the oil they're fried in, the ultimate source of these calories is not a potato farm but a field of corn or soybeans.

The calculation finally defeated me, but I took it far enough to estimate that, if you include the corn in the gas tank (a whole bushel right there, to make two gallons of ethanol), the amount of corn that went into producing that food feast would easily have overflowed the car's trunk, spilling a trail of golden kernels on the blacktop behind us.

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Some time later I found another way to calculate just how much corn we had eaten that day. I asked Todd Dawson, a biologist at Berkeley, to run a McDonald's meal through his mass spectrometer and calculate how much of the carbon in it came originally from a corn plant. It is hard to believe that the identity of the atoms in a cheeseburger or a Coke is preserved from farm field to fast-food counter, but the atomic signature of those carbon isotopes is indestructible, and still legible to the mass spectrometer. Dawson and his colleague Stefania Mambelli prepared an analysis showing roughly how much of the carbon in the various McDonald's menu items came from corn, and plotted them on a graph. The sodas came out at the top, not surprising since they consist of little else than corn sweetener, but virtually everything else we

ate revealed a high proportion of corn, too. In order of diminishing corniness, this is how the laboratory measured our meal: soda (100 percent corn), milk shake (78 percent), salad dressing (65 percent), chicken nuggets (56 percent), cheeseburger (52 percent), and French fries (23 percent). What in the eyes of the omnivore looks like a meal of impressive variety turns out, when viewed through the eyes of the mass spectrometer, to be the meal of a far more specialized kind of eater. But then, this is what the industrial eater has become: corn's koala.

~~So WHAT? Why should it matter that we have become a race of corn eaters such as the world has never seen? Is this necessarily a bad thing? The answer all depends on where you stand.~~

~~If where you stand is in agribusiness, processing cheap corn into forty-five different McDonald's items is an impressive accomplishment. It represents a solution to the agricultural contradictions of capitalism, the challenge of increasing food industry profits faster than America can increase its population. Supersized portions of cheap corn-fixed carbon solves the problem of the fixed stomach; we may not be expanding the number of eaters in America, but we've figured out how to expand each of their appetites, which is almost as good. Judith, Isaac, and I together consumed a total of 4,510 calories at our lunch—more than half as many as we each should probably consume in a day. We had certainly done our parts in chomping through the corn surplus. (We had also consumed a lot of petroleum, and not just because we were in a car. To grow and process those 4,510 food calories took at least ten times as many calories of fossil energy, the equivalent of 1.3 gallons of oil.)~~

~~If where you stand is on one of the lower rungs of America's economic ladder, our cornified food chain offers real advantages: not cheap food exactly (for the consumer ultimately pays the added cost of processing), but cheap calories in a variety of attractive forms. In the long run, however, the eater pays a high price for these cheap calories: obesity, Type II diabetes, heart disease.~~

~~If where you stand is at the lower end of the world's economic ladder,~~