



"FLIGHT PATTERNS" SHOWS 141,000 AIRCRAFT PATHS OVER A 24-HOUR PERIOD.

TRACKING AIR FARES

DELVE THROUGH BILLIONS OF TICKET PRICES TO FIND OUT WHEN TO FLY.

IN 2001, OREN ETZIONI WAS ON A plane chatting up his seat mates when he realized they had all paid less for their tickets than he did. "I thought, 'Don't get mad, get even,'" he says. So he came home to his computer lab at the University of Washington, got his hands on some fare data, and plugged it into a few basic prediction algorithms. He wanted to see if they could reliably foresee changes in ticket prices. It worked: Not only did the algorithms accurately anticipate when fares would go up or down, they gave reasonable estimates of what the new prices would be.

Etzioni's prediction model has grown far more complex since then, and the company he founded in 2003, Farecast, now tracks information on 175 billion fares originating at 79 US airports. The database knows when airline prices are going to change and has uncovered a host of other secrets about air travel. Here's a dose of expert advice from the Farecast data vault:

1. COMMON WISDOM IS WRONG ...

The lowest price tends to hit between eight and two weeks before departure. Buying tickets farther in advance usually doesn't save money.

2. ... EXCEPT WHEN IT'S RIGHT

The rule fails during peak demand: Friday departures for spring break, and Sunday returns during the summer, Thanksgiving, and Christmas. For these, now is never too early.

3. WHEN THE PRICE DROPS, JUMP

Fifty percent of reductions are gone in two days. If you see a tasty fare, snatch it up.

4. IF PRICES SEEM HIGH, HOLD OFF

Behavioral economists call it framing: If last year's \$200 flight is now \$250, you'll probably find that too dear and won't buy. Everyone else is thinking the same thing. So when airlines hike the price of a route, they often have to cut rates later to boost sales.

5. THE DAY YOU FLY MATTERS

Used to be, you could count on a cheaper fare if you stayed over a Saturday night. But during spring

break and summer, weekend trips are in high demand, so flights on Friday, Saturday, and Sunday can easily cost \$50 more than those midweek.

6. SO DOES THE DAY YOU BUY

Price drops usually come early in the week. So a ticket bought on Saturday might be cheaper the next Tuesday. That's particularly true outside the summer rush, making fall the best time for a last-minute getaway.

7. MARKUPS VARY BY DESTINATION

Flights to Europe in July can be \$350 higher than in May or September. If you want a summer vacation, domestic and Caribbean travel is cheaper to begin with and doesn't rise as high.

8. STAY AN EXTRA DAY

At the end of holidays, there's usually a stampede to the airport. One more day with the in-laws can save you upwards of \$100—if you can stand it.

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