You Can So Beat the Gambling House At Blackjack, Math Expert Insists

By Thomas Wolfe
Staff Reporter

Breathe a word of this to your gabby friends and the American Mathematical Society will have to move its convention from the Willard Hotel to Griffith Stadium.

A Massachusetts Institute of Technology mathematician will be here Thursday to show his colleagues "Fortune's Formula"—how to make $10 to $125 an hour playing the card game of "blackjack," also known as "twenty-one."

And that, if you are poor at figures, is $400 to $5000 for a 40-hour week, with two days off to contemplate the eternal verities.

What's more, the system is more than 99 per cent foolproof—or to use the words of its inventor, MIT's Edward O. Thorp, "there is a ruin possibility of less than 1 per cent."

"If this system should come into general use," Thorp told The Washington Post by telephone yesterday, "the game of blackjack as now played in the gambling casinos would have to be terminated."

Thorp worked out his system on an IBM-704 computer at MIT, but as he describes it, it's simple to use: "I would hazard a guess that 85 per cent of the persons who now gamble could master this system in less than an hour."

Thorp said a player should start out with at least $3200, to cover against a losing run. Over the long haul, $3200, split into betting units of $40, will bring you $10 an hour. Forty grand, in $500 units (the maximum in Las Vegas), will earn you $125 an hour, he said.

Thorp's "Fortune's Formula" is based on the fact that in blackjack, as now played in Las Vegas casinos, the dealer does not shuffle the cards after each hand—he keeps dealing off the old deck.

In blackjack, the dealer opposes each of the players. If the face values of the player's cards add up to closer than 21 than the dealer's, the player wins. But he loses if they total more than 21. The dealer also wins ties. Picture cards count 10, and aces either 11 or 1.

In the Thorp system, the player memorizes a chart that shows whether his hand is "favorable" or "unfavorable," according to orthodox statistical probabilities. Then he keeps track of how many fives have been used up in previous hands from the same deck.

If all four fives have gone, the deck now favors the player. In this case, when the player gets a "favorable" hand, he bets the limit. If both his hand and the "five situation" are not favorable, he bets the minimum.

Thorp, who is 28, said he did some thorough research at Las Vegas last year to make sure what the standard rules, betting limits and payoffs are, before feeding it all to the computer.

"Frankly, I would welcome a wealthy backer or a gambling casino itself to finance me in what we might call the acid test of my theory," said Thorp, who makes $7000 a year. "I haven't been able to accumulate the capital to undertake it on my own."