## Troubleshooting

Benford's Law provides a probability distribution for the first digit in the numbers in a data set.

| Digit | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| Probability | 0.301 | 0.176 | 0.125 | 0.097 | 0.079 | 0.067 | 0.058 | 0.051 | 0.046 |

The distribution has a history of accurately modeling a wide variety of data sets, including populations, lengths of rivers, and mathematical constants. Hank, a local insurance agent, decides to use this distribution to investigate the amounts of the small claims that people are making at his firm. Over a round of golf, his friend Roger suggests this might not be such a good idea.

