

FIGURE 4.2 The result of invalid mathematical operations will be the special values NaN and Infinity.

## TABLE 4.2 Operator Precedence

| PRECEDENCE | OPERATOR | NOTE |
| :---: | :---: | :---: |
| 1 | . [] | member operators |
| 1 | new | creates new objects |
| 2 | () | function call |
| 3 | ++ -- | increment and decrement |
| 4 | ! | logical not |
| 4 | +- | unary positive and negative |
| 4 | typeof void delete |  |
| 5 | * / \% | multiplication, division, and modulus |
| 6 | + - | addition and subtraction |
| 8 | \ll= \gg= | comparison |
| 9 | == != === !== | equality |
| 13 | \& \& | logical and |
| 14 | \|| | logical or |
| 15 | ?: | conditional operator |
| 16 | $\begin{aligned} & =+=-=^{*}=/=\%=\langle<= \\ & \gg=\ggg=\&={ }^{\wedge}=\mid= \end{aligned}$ | assignment operators |

The last thing to know about performing arithmetic in JavaScript is if the result of the arithmetic is invalid, JavaScript will return one of two special values:

- NaN, short for Not a Number
- Infinity

For example, you'll get these results if you attempt to perform arithmetic using strings or when you divide a number by zero, which surprisingly doesn't create an error (Figure 4.2). In Chapter 5, you'll learn how to use the isNaN() and isFinite() functions to verify that values are numbers safe to use as such.

