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It is known that the iterations, starting from any positive multiple of 3, of the function which associates to every positive integer the sum of the cubes of its base ten digits, eventually leads to the number 153. This leads us to a class of problems in which the use of technology to discover the limit cycles of similarly defined sequences is particularly useful as a classroom experience, since it provides an example of creative interaction between computer applications and algebra calculations performed by the students. (Received September 16, 2008)