

CHAPTER 2 — GPS—Global Positioning System

DOD - government agency protecting the security of our country.

Satellites - a manufactured object or vehicle intended to orbit the earth, the moon, or another celestial body.

Calculate - judge

Complex - complicated

Accessing - way of approaching

The Global Positioning System (GPS) was developed by the U.S. Department of Defense (DOD). Originally intended for the military, the government made GPS available to the public in the early 1980s. Today, thousands of civilians use GPS, but the DOD still funds and controls the system.

GPS is made up of 24 satellites and their ground stations. The satellites calculate their positions with complex mathematical formulas. Advanced GPS can measure locations within a centimeter. The system can operate in any weather condition and is available all over the world, anytime, day or night. Unlike cable TV, the Internet, or telephone services, there are no fees for accessing GPS.

Two new GPS products are under development and are being tested. The first, Verichip, is a digital device that stores medical information when implanted in a human. Such information could be valuable in a medical emergency. The second, Digital Angel, resembles a pager. Digital Angel tracks people who are on parole. These new products raise many questions. For example, can the government require a citizen to wear a chip? Should convicted felons be required to wear a GPS tracking device?

**Do you think GPS should be used to track people?
What benefits of GPS can you think of?**