

# Mobile Positioning

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The next wireless thing is mobile positioning. With mobile positioning, your phone could become a personal tracking device, allowing your family, friends and boss to know where you are at all times. Your mobile phone will serve as a location device as long as it is switched on. The function is due to new wireless technologies and old-fashioned math. Basically, operators can calculate where mobile phone users are based on their relative position to so-called base stations, which transmit mobile-phone signals.

Police have used similar methods to find out if suspects were near a crime location, simply by checking whether phone calls were made near certain base stations. Using similar techniques, emergency services have been able to locate fires and accidents, even if phone calls from people in need of help had been cut off. Now, it's finally time for commercial services. In Scandinavia, where most everybody has mobile phones glued to their ears most of the time, a slew of new services has started. MobilePosition AB, a Swedish high-tech start-up, developed a few sample services called YachtPosition, BikePosition, and FriendFinder.

All three MobilePosition services work on the same principle: The operator automatically positions the user of the service. The location is then used to guide the user to whatever he wants to find, if the information is available. The first such services are bound to be vertical, which means they are geared to a special user segment, such as sailors for YachtPosition and bike riders for BikePosition. But eventually, positioning technology will enable many different applications, handy both in private life and at work.

YachtPosition is handy for sailors. After dialing up the service, users immediately know their position in longitude and latitude. They can then check from a menu to find out if whatever they need is nearby: Marinas, bars, shops, mechanics, supplies -- it's all there, be it only for users in Sweden and Florida for the moment. Many sailors are enthused about the project because it gives them live updates on the weather and even wave heights.

BikePosition works just the same, but is geared for bikers. The service will tell you if weather conditions are appropriate for a bike ride (rain vs. clear skies), and allow users to find whatever they need in a 50-kilometer radius. Pilot versions of both services have drawn thousands of users so far. YachtPosition has 20,000 registered users, while BikePosition has 5,000. And that's just in Sweden: The service will soon be available in the rest of the world.

FriendFinder is for everyone, not just sports fanatics: It knows a user's position in relation to friends or colleagues with mobile phones. To use it, you first have to turn to your PC, though. On the Web, users register a "buddy list," which contains all the people one wants to find on a regular basis. The application then sends an e-mail or short message to the people on the list, asking them if they want to be on your list at all and, if so, when they want to be "localized." They can choose between "only office hours" and "only weekends" and several other options. No one will be able to see a user's position unless he has authorized it.

However, the service is precise only up to about 500 meters. If friends get any closer than that, the phone won't know exactly how close they are. A further drawback of all of these positioning services is that they are accessible mainly via WAP, which forces users to waste minutes logging into Web portals -- not exactly an easy thing on a yacht, for example. Both issues are bound to be resolved when more advanced and faster communication networks get built in years to come.

Whatever the benefits of the service, one should be aware that the service measures only distance. There is no distinguishing between a person being at the office or the bar right below it.