## **Can Texting Improve Diabetes Care?**

July 15, 2011 12:00 PM Keith Brannon kbrannon@tulane.edu

For most of us, it's the gadget that's never far away. But, for diabetics, could the cell phone be the key to keeping their blood glucose in check? That's the question Dr. Vivian Fonseca asks in new study that uses computer software and text messages to help diabetics manage their blood sugar.



A study now under way at Tulane will determine if patients will better monitor their sugar levels with reminders via text messages on their cell phones. (Photo by Paula Burch-Celentano)

In the study now under way at Tulane, 50 diabetics get daily reminders to text in the day's first blood sugar readings. The system evaluates their readings based on standardized algorithms and can advise the patient to adjust insulin doses if needed, says <u>Fonseca</u>, who holds the Tullis-Tulane Alumni Chair in Diabetes.

If the readings are out of range, a computer system alerts endocrinologists who monitor the patients' progress. If glucose readings are dangerously high, the system will automatically have an operator call the patient to get him or her on the line with hospital emergency staff.

Researchers are evaluating whether the system helps patients improve their hemoglobin A1C levels over a six-month period, says Roberta McDuffie, director of clinical research for the Department of Medicine's Section of <a href="Endocrinology">Endocrinology</a>, <a href="Diabetes">Diabetes</a> and <a href="Metabolism">Metabolism</a>.

"This study is very much in line with the current trend in diabetes management, which is to look for ways to improve people's disease management that are easily accessible for the patients, and integrated with their lifestyle," she says.

Doctors can only do so much; research shows that more than 90 percent of a patient's diabetes outcome is related to self-management. So far, early results of the study are promising, McDuffie says.

The Remote Diabetes Monitoring Study is funded by investigator-initiated grants from the pharmaceuticals industry and MedAdherence, which developed the software for the study. Fonseca hopes to expand the program to test whether it can improve drug compliance for patients with other chronic conditions.