A Fable: Maluva and Alissi The Story of Two Newcomers to the Town of Calculus

Emilio O. Roxin University of Rhode Island UME Trends, January 1991

Once upon a time two young ladies, Maluva and Alissi, came to the town called Calculus. This is a section of the greater city of Mathematics, and people had warned them that this is a particularly confusing town. Many people who had arrived very enthusiastically could not find their way around and, frustrated, finally gave up and left town.

Maluva was strongly determined to succeed. She was going to learn her way through the town, For example, in order to learn how to go from her dorm to class, she concentrated in memorizing the clearly essential information: She had to walk 325 steps south, then 253 steps west, then 129 steps in diagonal (south—west), and finally 86 steps north. It was not so easy to remember all of that, but after getting help to walk the same path 50 times, she began to get the hang of it. In order to stick to the strictly necessary information and avoid overburdening her memory with additional uncessary information, like the color of the adjacent buildings or the existence of trees and bushes nearby, she always walked blindfolded.

After repeated exercising, she succeeded in learning her way to class and also to the cafeteria. But there were too many routes to memorize: To the grocery store, to the bus station, to a nice restaurant, to the bookstore, and so on. It was overwhelming! A lot of times she ended in a wrong place, which could be quite embarrassing on occasions. Finally she gave up: Calculus was too complicated for her.

Alissi, on the other hand, was of a much less serious nature. To the shock of many, she did not even intend to memorize the number of steps of her walks. Neither did she use the standard blindfold that students need for learning, and she was always curious, looking at the different buildings, trees and bushes nearby, and everything else not related to her walk. Sometimes she walked dead—end alleys in order to find out where they lead, even if it was obviously superfluous.

Curiously, Alissi succeeded in learning how to walk from one place to another. She even found it easy and amusing. It was obvious that she was particularly gifted; she must have had some very special genes.