



## Horácio Carlos Panepucci 1937-2004

It is an honor to have this opportunity to write a foreword to this issue of *The Brazilian Journal of Physics* dedicated to Horácio Carlos Panepucci. My profound regret is that an unexpected and short illness ended his life too soon, such that this recognition of the achievements of our professor was not made while he was still alive. The many articles in this issue already tell how important professor Panepucci was for the Brazilian Physics community working in magnetic resonance. His work was fundamental for the establishment of several groups in Brazil and in other countries dealing with different aspects of magnetic resonance. I first met Horácio in 1976 as an undergraduate student. Horácio was then responsible for the Solid State physics course. At this time he and his students began setting a new laboratory and constructing spectrometers for Electron Paramagnetic Resonance with very limited material resources. In a scenario with severe budget and other restrictions, Professor Panepucci found a number of solutions to keep science alive. The building of scientific instruments was a lesson, and a passion, always taught by Horácio to all his students. It is important to note that at that time it was not easy to obtain research grants and to buy imported equipment even when funding was available. There were many restrictions to use hard currency, even with the necessary funding; it was always necessary to go through a long list of importation licenses and requirements. As a graduate student in São Carlos, I attended classes taught by him and joined his laboratory. His classes were always stimulating and required a lot of work from the students. The atmosphere of his group was challenging and friendly. His research ranged from pure solid state physics to EPR dosimetry, optical spectroscopy in magnetic fields, solid state Nuclear Magnetic Resonance (NMR). More recently, he was deeply involved with NMR for medical imaging (MRI). One of the outstanding achievements of his group was the full development of a whole body 0.5 T scanner that is operating in a local hospital. This project had a great visibility in the medical community and showed how basic research can lead to an important application with social impact. After this major triumph, his research group continued the work on medical images, developing coils and other instruments. A small MRI scanner prototype, suitable for the extremities of the human body, such as arms, legs, hands and feet, has been developed. Horácio also devoted a significant part of his time serving the community through administrative duties at his Institute and the University. He was enthusiastic of the undergraduate teaching laboratories and gave full support for all teaching activities. Horácio trained and influenced many students. His work and his examples will continue through this second generation and their successors. In this special issue of the Brazilian Journal of Physics we have 15 articles dedicated to Horácio, several of them with a touch of his own scientific contribution.

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Guest editor  
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