TELEMEDICINE: PRIMARY HEALTHCARE - a New Way to Take Healthcare Services to Brazilian Slums

Claudia N. Barsottini, Paulo Lopes, Paulo Paiva, Dirce M. Sigulem, Monica P. Ramos, Meide S. Anção, Daniel Sigulem
Departamento de Informática em Saúde, Universidade Federal de São Paulo
telemedicina@epm.br, http://www.epm.br/atenas

Telemedicine acts as a catalyst of technological resource innovations in healthcare services, characterized mainly by the University’s extramural assistance; be it the knowledge of trained specialists concentrated on University campus to distant and riskful communities. The state of art is the use of mediated systems through computer; Internet and the vast infrastructure of mass communication made available by telecommunications companies. Telemedicine is normally used in hospitals and health institutions which seek, consult, and exchange reference information with other institutions; in attention to chronic patients, the elderly and high-risk pregnancies; in direct patient homecare of primary health assistance in communities located in disadvantaged geographical areas and/or sociocultural differences. The Federal University of São Paulo (UNIFESP) maintains through its undergraduate and graduate programs a service of assistance and education (teaching, training) in basic healthcare activities to the needy areas of the city of São Paulo. “Projeto Favela”is one of these projects, which after 10 years of combating malnutrition and anemia in two slum areas in the neighborhood (district) of Vila Mariana of more than 1,500 residents, obtained a reduction by 76% in the incidence of anemia, and a 40% cure of malnutrition in children under 5 years of age. This work is done through the means of house visits by health assistants from the same community and a team of students, taking into consideration the real (actual) circumstances of the family, giving priority to high-risk cases. The chief objective of this project is to attend and give healthcare services to high-risk communities, based on the intensive use of Telemedicine, in order to broaden the capillarity of health-care activities and the competency of the professionals who perform in the solution and management of these problems. The main purpose is to investigate the use of systems in simple communication, low cost resources, adjustment of each technology of every type of healthcare service and its impact in primary healthcare assistance. The pilot project of Telemedicine in the slums involves 15 health professionals; 12 in the area of development of information technology which is devided into four levels: health services, applications, computer infrastructure and communication infrastructure. This project is being developed in cycles of three phases: Phase 1: identification of goals, services and resources; Phase 2: project; and phase 3: validation and evaluation. Basic resources offered through computer digital lines ISDN, such as: electronic forms; Internet accessed database for the gathering and analyzing of demographic information, socio-economic, nutritional and community clinics; appointment booking system; availability of exam results; teleconferences for surveillance, discussion and orientation in medical cases. Conclusion: Expand activities of health professionals and community healthcare workers, improving the quality of primary assistance in children’s health, of women and the community. A mechanism for continuous attendance has been provided to offer prevention, diagnosis and treatment to the population according to existing local conditions, considering the technical and social viability by applying available technological resources.