

# Presumptive Diagnosis and Awareness for STDs via SMS for Young Cambodians in Rural Areas

## Overview

The project is designed to use Information Technology (ICT), particularly mobile telecommunications, to improve healthcare services in Cambodia. In the project, a SMSbased application for mobile phones is developed to encourage young Cambodians to get advice on STDs from professional medical staffs via more convenient and undisclosed means.

## Problems and Motivations

According to the statistics of the Reproduction Health Association of Cambodia (RHAC), 40% of its patients were affected with common STDs such as Chlamydia and Gonorrhea because of:

- Lack of information on how to be protected against STDs;
- Unawareness of sanitation and inadequate access to care;
- Social and cultural barriers (e.g. being infected with STDs is shameful to the family and unacceptable to the community); and
- Consultation with unprofessional doctors or use of traditional methods.

Our motivation is:

- 90% of medical staff have mobile phones;
- 70% of young people have mobile phones; and
- 70% of young people are using SMS regularly.



Fig.4 Popularity of Mobile Phones among Teenagers

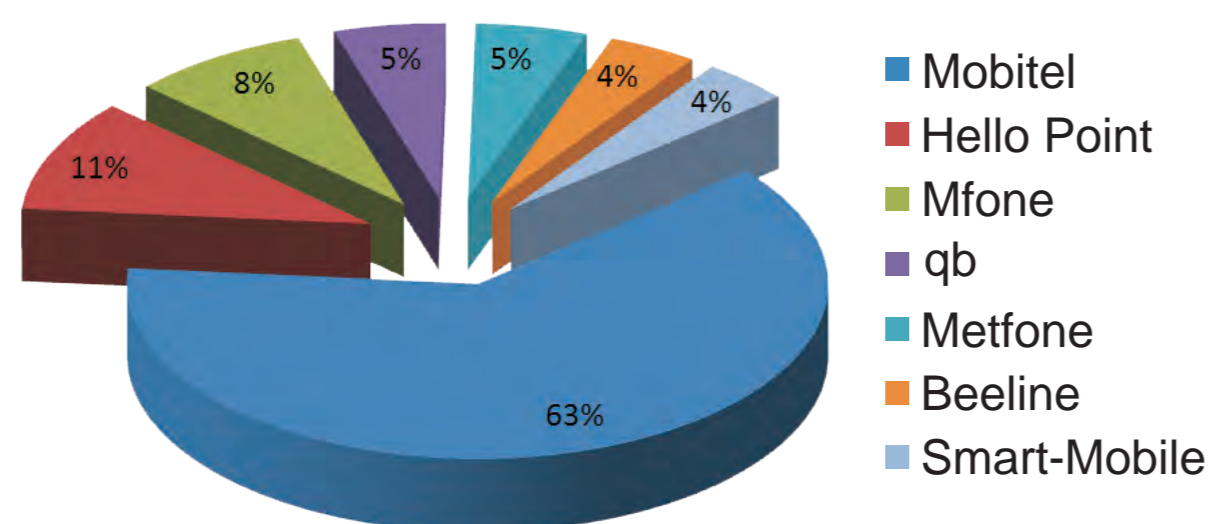


Fig.1 Mobile Operators in Cambodia

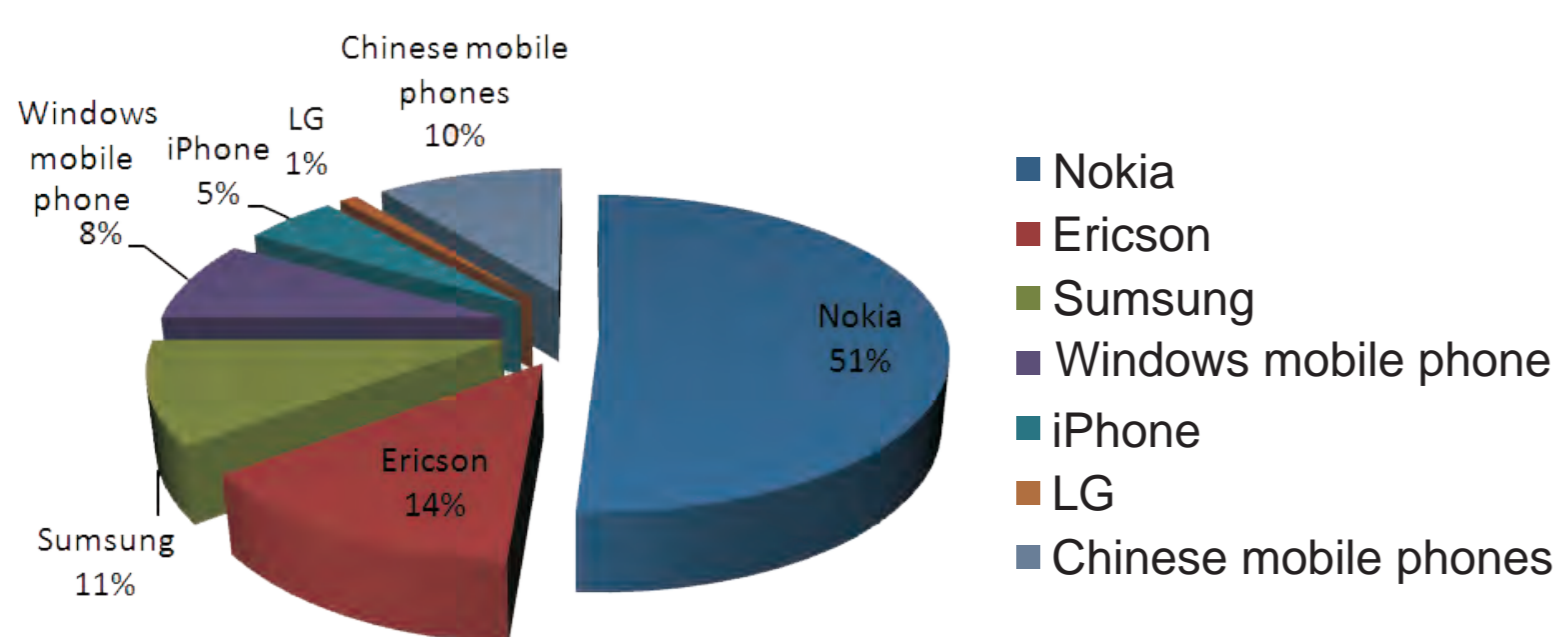


Fig.2 Types of Mobile Phone in Cambodia



Fig.3 Cambodian Teenagers with Mobile Phones

## Partners



Fig.5 RHAC Office



Fig.6 National Pediatric Hospital



Fig.7 Smart-mobile Operator Headquarter

## System Design

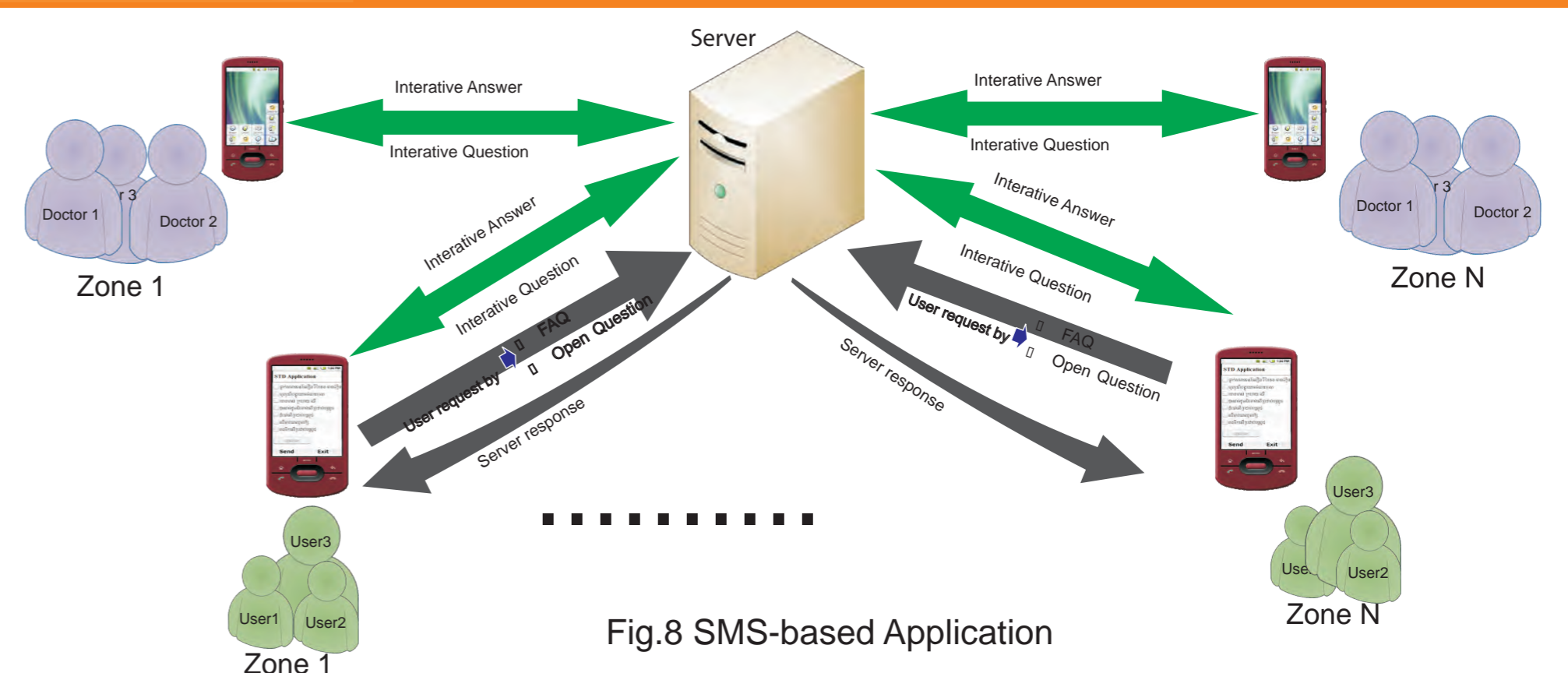


Fig.8 SMS-based Application

## Works in Progress

- Developing an SMS-based application
- Working in collaboration with Smart-mobile phone operator in Cambodia
- Working closely with RHAC as partner to implement the application

## Contributions

- Motivate teenagers to seek advice about STDs from professional doctors
- Increase awareness of STDs among young people
- Expect to reduce the death rate from STD-related diseases
- Provide a model to improve healthcare in Cambodia with ICT
- Provide Computer Science students with opportunities to understand how to employ mobile technology to solve social problems