Wanunya Ritthisit 2009: Analysis and Development of Patient Service System Case Study: Outpatient Service in Sakon Nakhon Hospital. Master of Science (Statistics), Major Field: Statistics, Department of Statistics. Thesis Advisor: Associate Professor Chirash Sukhagate, M.S. 150 pages.

The purpose of this research was to compare the outpatient service system of the 3 division Medical record, Outpatient clinic and Phamacy service of Sakon Nakhon Hospital, The study were as follow

The old system of register department consists of a officers two verify authority, one filters information and givers line tickets, three find cards, three register for sending patients and the rest records the new patients. The new system is similar to the old system but add up two officers who filter informations and give line tickets. In 100 simulations result is to the first system took the average time less a 60% of old system and the percentage available service is not over 50% that is better than the old system average time

Outpatient clinic (Sergery and Medicine) the old system of surgery clinic consists of one officer weights and tests pressure one interviews symtomatic patients, two doctors and one officer make and appointment and copies prescription. The first system is similar to the old one but the treatment starts at 9.30 and thirty minutes earlier than before). The second system is also similar to the old one but add up one more doctors. In 100 simulating result is to the first system took the average time less than 70% of old system and the percentage available service is over 50%. The old system of medical clinic consistes of one offer weights and tests pressure, one interviews symtomatic patients, Three doctors and one officer makes an appointment and copies prescription. The first system is also similar to the old one but the treatment starts earlier at 9.30 am. In 100 simulating result is to the first system took the average time than 60% of old system and the percentage available service is not over 50% that is better than the old one.

The old system of Phamacy service consists of one officer confirms the prescription Three type lables of medicine, one attaches the lables, one packs, one checks the right medicine to the right prescription and one calls the patient and recommands how to take medicine. The first system consists of one officer confirms the rescription, two type the lables of medicine, two attaches the lable, one packs, one checks the right medicine to right prescription and one calls the patient and recommends how to take medicines. The second system is also similar to the first system but add up one move officer who confirms the prescription. In 100 simulating result is to that three systems are similars. But the first is the most suitable

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