
CONFERENCE ABSTRACT

Economic evaluation of the integration of a pharmacist in the primary care home-based care team

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In Spain, primary care teams -made up of a nurse and a general practitioner (GP)- provide home-based care for complex patients with chronic severe conditions that impede them from accessing to the primary care centre. These patients are usually polimedicated and highly disabled. Usually, a patient's relative provides is responsible of providing help with the management of their medications. Including a pharmacist in the home-based care team could improve the detection of drug-related problems and improve patient care. Taking into account the high costs that these patients generate to the system, we hypothesized that the pharmacist could be introduced as part of the team at a relatively low cost.

Chronic and complex patients with mobility problems from the primary care centre Montnegre were included in the service. The home-based care at the PC Montnegre is usually provided by two teams of GPs and nurses. Three pharmacists were integrated in these teams. Prior to the home visit, the team reviewed the patients' clinical history (health problems and medication). At the patients' house, the pharmacist reviewed the patients' medication (prescription medicines and over-the-counter medication). Then, the pharmacist searched for drug-related problems and suggested interventions to the GP and nurse to stop or prevent future harm to the patient. The GP and nurse evaluated the appropriateness of the suggested interventions.

Use of services was assessed using the patients electronic records. Information was gathered on costs for the public health system (visits to primary care, secondary care, hospitalisation and tests). Cost of the pharmacist was calculated taking into account the hours spent on the patients' house and reviewing the patients' clinical history and medication.

The service was provided to 50 patients. Mean age was 86.3 years old. All but one of the patients had an informal carer. Health related quality of life was low (mean EQ-5D tariff=0.38) and patients took a mean of 9.4 different drugs. The pharmacists identified a mean of 5.1 drug-related problems per patient and suggested 143 interventions (most commonly monitoring the evolution of a biochemical parameter [44.1% of interventions] and

removing or adjusting the dose of a medication [41.3% of interventions]). Overall, 75.5% of the suggested interventions were accepted by the team of GPs and nurses.

The overall mean cost per patient in 6 months was of 3,533.8€. The mean cost per patient of the pharmacist was 116.4€, representing an 8.7% increase in the total cost of the patient.

Patients requiring home-based care are complex patients that generate a high burden to the health system. Although these patients are under close medical supervision, the integration of a pharmacist in the team of home-based care led to the identification of a number of drug-related problems. The relative cost of including a pharmacist as part of the team of home-based care was low. In Spain, pharmacists provide ambulatory care in privately managed community pharmacies and are not seen as a part of the health system structure. This difficult the coordination with the primary care teams and was the main barrier for collaboration within the team. Future studies should evaluate the factibility and efficiency of integrating a pharmacist in the home-based care team using a control parallel group and a longer follow up.

Keywords: home-based care; collaborative care; pharmacist; costs
