

TITLE: Medical time spent on producing health data in French hospitals and organizational leverages to reduce it

Introduction

The performance of health resource allocation is associated with health data volume and quality. However, raising the data demand increases the administrative burden of healthcare professionals, which is becoming harder to bear in France. Few papers focus on the data production process issues in healthcare organizations. At the beginning of 2023, the French technical agency for information on hospital care (ATIH) conducted a quantitative study to assess the burden on clinicians associated with producing and collecting medical data, with two main objectives: (1) to produce an inventory of health data production methods and (2) to quantify the average weekly time spent by clinicians on producing and collecting hospital health data.

Methods

An online questionnaire was distributed to every health information department's head in short-stay hospitals, for transmission to clinical departments. In addition to the standard identifying variables (hospital's identification number, department speciality, etc.), the questionnaire was used (1) to identify the role of the various professionals (physician, paramedics, administrative workforce, health information professionals, etc.) in collecting ICD-10 diagnoses and procedures codes, and (2) to evaluate the average weekly time spent on producing medico-economic data, research data, data used for internal management purposes, etc.

Results

The results of 193 departments out of 349 respondents from 91 healthcare institutions (out of 1817) were analysed. Diagnosis coding organization depends on the hospital's profile: the smallest public hospitals, private non-profit hospitals, and surgical departments appear to use professional coding more frequently than the other departments. Concerning the procedure coding, practitioners almost always identify the code corresponding to their practice. The median time spent producing medical information is estimated at two and a half hours, with a distribution of the last quartile range from six and a half hours to thirteen hours per practitioner per week. There is a significant link between time spent producing health data and the domain of activity, the hospital's size, and the organization of the production process. 57% of the observations had a full professionalized diagnoses coding process, meaning without any physician intervention. The time spent by practitioners in this last organization was two hours vs four hours in a non-professionalized organization. The load on healthcare professionals appeared to be significantly reduced, especially on the last part of the production process, which is data entry on software platforms.

Discussion

Despite the limitations of the analysis due to the relatively small volume of data, it appears that the time spent by healthcare professionals in health data production is highly variable. There are multiple ways to reduce the burden on healthcare professionals, such as professionalizing data production, especially on the low-adding value steps of the data production process.