Interdisciplinary assessment of adherence to guidelines: a bold step

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Guidelines from professional societies have acquired a prominent position in medicine. Conceived with the purpose of assisting clinicians in daily decision-making, they now delineate entitlements of patients, including reimbursements, they provide a basis for professional audits and, not the least important, they provide a framework for legal procedures.

The degree to which clinicians adhere to guidelines has been the subject of numerous studies, usually based on surveys of real world practice. It is unusual, however, for physicians to analyse guidelines from other disciplines and to quantify adherence by other physicians to their own guidelines. This remarkable step was taken by Esselink et al., as described in this issue of the *Netherlands Heart Journal*.¹ They retrospectively studied the records of nearly 300 subjects referred by a general practitioner (GP) to their outpatient cardiology department for evaluation of stable chest pain. Referral letters were checked for completeness and used to assess adherence to the guideline issued by their professional society (NHG).² Additional information regarding the initial workup and the referral process was obtained by telephone interviews with patients. The authors found that the referral letter was complete in only 23% of cases. Items most often lacking were physical examination (63%) and cardiovascular risk factors (62%). Based on the referral letter, only 8% of patients were evaluated by their GP in accordance with their own national guideline. In patients in whom the diagnosis of coronary disease was made by the cardiologist, this was 20%. The authors conclude that only a minority of patients with stable chest pain were evaluated

and treated by their GP in accordance with their own national guidelines. Furthermore, their referral letter was often incomplete.

The accessibility of the guideline is not likely a limiting factor for adherence. All GPs in the country are aware of these guidelines and they are readily retrievable on a website. Other explanations for the low adherence rate described in this paper need to be considered.

First, elements of the guideline may not be practical or realistic. It is questionable, for instance, whether a GP needs to go through all the diagnostic steps if the diagnosis is clear and an indication for referral is established. Given the urgent nature of the complaint in at least a proportion of patients, and given the time constraints in practice, GPs may appropriately decide to skip some of the steps outlined in the guideline. Some elements of the work-up are indispensable, however. For instance, failure to perform a physical examination may be regarded as a more serious form of non-adherence. The adherence rate to this requirement amounted to 80% when the verbal information from the patient was included. However, this is likely an overestimation, since taking a pulse or a blood pressure classified as a physical examination in the study. Similarly, the failure to start drug therapy in about half the patients may be regarded as inadequate.

Second, a guideline may be outdated. The present guideline dates from 2004, which may not be regarded as up to date for a study that included patients who were referred in 2007. However, no important changes in the management of this type of patients have been implemented in these years.

Third, local referral patterns may differ from guidelines based on existing expectations among GPs and cardiologists. The contribution of the regional cardiology department in these patterns, if any, cannot be derived from the data presented in the paper.

Finally, a lack of discipline needs to be considered. With no incentives for the individual GP, either positive or negative, the motivation to adhere to

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guidelines may be limited. It has been shown that incentives can dramatically improve adherence and in some situations they have been shown to improve the patient's outcome. One of the most striking examples is Kaiser Permanente's (KP) proactive approach, which includes rewards and penalties. In California, this Health Maintenance Organisation has presented evidence that heart disease mortality rate, after age-sex adjustment, is more than 30% lower in the KP population than in the non-KP California population.³ Another provocative study from the University of California system explored the impact of a variety of organisational strategies to improve quality of care. The investigators studied 9746 patients with diabetes from 57 provider groups and assessed the impact of organisational incentives and processes on cardiovascular outcomes. 'Alignment' of financial incentives for physicians with quality targets significantly increased guideline adherence for lipid-lowering therapy and was (statistically) independently associated with 59% fewer congestive HF admissions.⁴

It is unclear whether the lower than expected adherence rates resulted in harm to patients. Non-adherence to the guideline may lead to failure to establish a correct diagnosis or failure to initiate appropriate treatment, causing unnecessary delays that result in avoidable mortality, morbidity and loss of productivity or quality of life. An answer

to this question would require an analysis of the entire cohort of patients who present to the GP's office with chest pain. By analysing only those who were referred (and survived to see a cardiologist), important subgroups of patients may be missed. This cannot be derived from the data. However, it is unlikely that this would involve large numbers of patients.

GPs were apparently not involved in the study or in the publication. Their contribution could have enhanced the paper and could help to reduce the potential for sensitivities among the professionals. Hopefully, this publication will result in constructive discussion of the findings and to improvements of the care of patients with stable chest pain, both in the region and in the country. ■

References

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