

Cloned Notes: Is the Problem Related to Electronic Medical Record Systems Only?

Muhammad Sarmad Tamimy

'Cloned notes' or 'copied and pasted notes' is a problem thought to be associated with Electronic Medical Record (EMR) Systems.¹ But perhaps this inconspicuous tradition has long been practiced in the paper format of medical record keeping as well. In a country like Pakistan where EMR is still in its infancy, copying notes even on paper leads to a significant proportion of our patients' falling victim to this phenomenon.

A 29 year old male reported to a teaching hospital with a history of a progressively enlarging swelling of left lower jaw. An OPG and a CT Scan were done that confirmed the involvement of the mandible. A biopsy of the lesion was taken and the histopathology report showed the swelling to be composed of multinucleated giant cells. A number of differential diagnoses were also given starting with a giant cell granuloma. Immunohistochemistry was suggested to narrow down the list.

The case was sent for discussion in the Head and Neck Oncology Clinic. The resident who presented the case 'copied' the salient features of history, clinical examination, CT scan and histopathology reports. As the resident was more familiar with the diagnosis of giant cell granuloma of the mandible as compared to other mandibular lesions harbouring giant cells, he labelled the case as giant cell granuloma, disregarding the word differential diagnosis as well as the suggestion for immunohistochemistry.

From then onwards the case was documented as a case of giant cell granuloma. An appropriate date for surgery was given. During the surgery the tumour appeared to be particularly vascular and even the external carotid had to be ligated to achieve hemostasis. The tumour appeared to be encroaching over a large area of soft tissue from the mid cheek to the middle of the neck. As the resection had to be more extensive than planned, and took a much longer

time, immediate mandibular reconstruction had to be abandoned and the tumour resection site simply covered with a large soft tissue free flap.

The histopathology of the resected specimen showed it to be a case of rhabdomyosarcoma, which luckily had been completely resected. As diagnosis of a malignant tumour was never at hand, therefore a tumour clearance befitting a malignant lesion was not planned at surgery. Patient later on underwent chemo-radiotherapy and had to wait for three years without one half of the mandible, with its associated morbidity, before he could undergo mandibular reconstruction, the results of which were far less satisfactory because of the delay in reconstruction and presence of the irradiated flap and neck region.

How very often in a busy ward or outpatient department sketchy notes are written down in illegible hand writing. Once a provisional diagnosis is made by mostly a junior clinician, just like in the case presented above, it is copied and reproduced on the next document and the next and so on. The fate of the above patient may not have been different even if the histopathology report had not been copied and that too in a truncated manner, but it just signifies the role of each clinician to reassess the history, clinical findings as well as all the available reports of the patients before documenting them.

'We are all prone to cognitive bias'¹ A cognitive bias is a pattern of deviation in judgment that occurs in particular situations, leading to perceptual distortion, inaccurate judgment, illogical interpretation, or what is broadly called irrationality.² Once a diagnosis has been made on the basis of limited clinical information, this tends to stick in our minds and with the patient and it is not correlated with the ongoing patients' clinical assessment and availability of further investigations. The issue is further worsened by referring to the patients by their diagnosis during our clinical rounds and discussions, so the initial provisional diagnosis made at the time of admission is repeatedly verbally and ingrained into our minds. Even if a diagnosis has been improved upon in the later notes, this does not show up on the patient's document cover or the bed-side labels and therefore many a time the discharge letters still show the

Correspondence

Dr. Muhammad Sarmad Tamimy
Department of Plastic & Reconstructive Surgery
Combined Military Hospital
Pano Aqil Pakistan
E mail: tamimy1398@yahoo.com

initial diagnosis that was documented at admission by simply copying it from the first page / cover of the documents.

According to the American College of Physicians (ACS) ethics manual, physicians should assure and have confidence, that entries in the medical record, paper and/or electronic, contain accurate and complete information about all communications including those done in person and by telephone, letter and electronic means.³ Obtaining appropriate information from the patients, their investigation and assessing and re-assessing their documents and deciphering them to reach a diagnosis and then to re-confirm the correct diagnosis at each step of patient management is of course more important than trying to heroically (mis)manage the patient for a wrong diagnosis. Once we have endorsed our notes and signed them, the authenticity of the notes becomes our sole responsibility by ethical as well as legal point of view. An additional aspect is the lack of communication between the clinicians, either due to lack of time or due to possibility of an inappropriate response by the referred physician.

The medical record keeping is not addressed efficiently in our hospital management system . There are few methods which need to be inculcated in our hospital practices to avoid any untoward effects of cloned / copy-paste notes. First and foremost is the need for re-realizing and teaching the importance of comprehensive documentation, avoiding repetition of unnecessary clinical and investigative jargon thereby missing important findings. Secondly, the notes should be in legible hand writing. Thirdly, notes copying should be avoided and if done at all it is best to re-study the original notes or investigations instead of copying from the last documented notes. The important thing to remember is that once signed these are no more copied notes but are independent notes and the signing clinician is responsible for the authenticity of the information given.

Next is the importance of communication between the referring and referred-to clinicians. Once the case is verbally discussed, this requires one's own comprehension of the patient's condition, diagnosis and planned management thereby automatically reducing the effects of notes cloning. Lastly, one of the suggested methods of removing cognitive bias is the metacognition, i.e., cognition of the fact that there may be cognitive bias. A reasonable approach should be step back for a moment, reassess the situation (the patient's condition, the documents and the investigations) and make a plan for further approach to the management.⁴

REFERENCES:

1. Rattner S, Mathes M, Siegler E. Copied and pasted and misdiagnosed (or cloned notes and blind alleys). [Internet] Medscape Education 2012 May 16. [Cited 2012; May 18]. Available from: <http://www.medscape.org/viewarticle/763617>.
2. Kahneman D. [Internet] Cognitive bias, available from URL <http://en.wikipedia.org/wiki/Cognitivebias>. Accessed on June 17 2012.
3. Synder L. American College of Physicians Ethics, Professionalism and human rights committee. American College of Physicians Ethics Manual. 6th edition. Ann Intern Med 2012;156:73-104.
4. Croskerry P. The importance of cognitive errors in diagnosis and strategies to minimize them. Acad Med 2003;78:775-80.