

Telemedicine: Could it represent a new problem for spine surgeons to solve?

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Nicola Montemurro, MD, PhD^{1,2}

Dear Editor,

Recently, I read with great interest the articles 'Telemedicine in Spine Surgery: Global Perspectives and Practices' by Riew et al.¹ and 'Telemedicine in Spine Surgery During COVID-19' by Mungmunpuntipantip and Wiwanitkit,² in which the authors showed how COVID-19 pandemic resulted in a significant increase in telemedicine utilisation, particularly in North America and Europe.¹ It also revealed significant geographical differences in the use of telemedicine adoption and platform of telemedicine used all over the world.^{1,2} According to Mungmunpuntipantip and Wiwanitkit,² telemedicine cannot replace the real physical examination in case with neurological problem due to spine disease, as at this moment it seems that phone calls without video were the most common form of telemedicine (33.8%), followed by non-secure videoconferencing programs (Facetime, Skype, etc.) (25%).¹

Although telemedicine is showing to provide convenient and safety health care to patients during COVID-19 pandemic, there is still much uncertainty as to whether it will have a permanent role in treating spine patients.³ Although telemedicine is a new and rapidly evolving field, it is important to pay attention to potential malpractice litigation in telemedicine that could occur, as misdiagnoses or failure to identify pressing issues at home may create legal implications.⁴ Traditional neurological assessments require detailed physical analysis to assess the presence of any neurological deficits. Telemedicine misses subtle early signs which helps to do early diagnosis and investigations in neurology.⁵ For example, in patients with extreme low back pain, clinical evaluation is important to distinguish a spinal disease such as compressive myelopathy or radiculopathy from a knee or a sacroiliac joint or a peripheral nerve disease. Similarly, the correct diagnosis of a cauda equina syndrome can be identified only with clinical correct assessment performed with patient's rectal tone, perineal sensation and lower extremity examination.^{5,6}

Recommending a surgical treatment without the ability to perform a physical examination may deter telemedicine adoption at the first consultation.⁷ Additionally, as several studies showed that the strength of the doctor–patient relationship may be inversely correlated with the likelihood of

malpractice suits, strong relationship may be more difficult to develop across a screen.⁸

Telemedicine paradoxically offers better timeliness of some medical and pain treatments, with several benefits for patients, each of the components of a virtual visit represents a potential area for legal concerns.³ The lack of a standard legal framework causes some doubts about patient privacy, liability coverage for treating healthcare workers and financial reimbursements by insurance companies. Inferiority of remote neurological exam, patient confidentiality concerns and privacy, the importance of in-person presence to establish the physician patient bond and acuity of disease processes treated are all reasons why the field of spine surgery has been slow to adopt telemedicine. ^{6,9} COVID-19 pandemic doubtless created a unique opportunity period for a productive telemedicine experience for spine surgeons and their patients; however, the failure to reach the correct diagnosis and the lack of legal regulation in telemedicine makes it easy to run into medico-legal problems, creating new problems to solve for spine surgeons. Finally, spine surgeons should verify that their medical liability insurance policy covers telemedicine services.⁶

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Corresponding Author:

Nicola Montemurro, MD, PhD, Department of Neurosurgery, Azienda Ospedaliera Universitaria Pisana (AOUP), Via Paradisa, 2, Pisa 56127, Italy. Email: nicola.montemurro@unipi.it



Department of Neurosurgery, Azienda Ospedaliera Universitaria Pisana (AOUP), Pisa, Italy

² Department of Translational Research and New Technologies in Medicine and Surgery, University of Pisa, Pisa, Italy

Montemurro 1307

ORCID iD

Nicola Montemurro, MD, PhD https://orcid.org/0000-0002-3686-8907

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