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Other reading room features, such as temperature, humidity and air quality can also have significant impact on the health and productivity of radiologists. Having control over the indoor climate is a key feature of effective reading room design. The highest productivity occurs at approximately 72 degrees Fahrenheit (22 degrees Celsius).⁵ The American Society of Heating, Refrigerating, and Air Conditioning Engineers recommends that ventilation systems pump in 15-20 cubic feet of fresh air per minute for every person in an office setting. If your reading room ventilation is not up to this standard (and most aren't—5 cubic feet per minute per person is common), you may be breathing bad indoor air.⁶ Headaches, nausea, dizziness, irritability, itchy eyes and respiratory illnesses may all result.

Also pay attention to reading room acoustics. A noisy environment negatively impacts concentration and adversely affects voice-recognition dictation software. Options include sound-absorbent materials on the walls and in the flooring, and more active sound-masking systems that can produce white noise in a frequency similar to that of human speech, which helps to reduce distractions. Background music (without lyrics) has been shown to increase productivity, and recent research by the Rensselaer Polytechnic Institute found that the sounds of nature are just as effective as white noise in masking distracting sounds and speech while “enhancing cognitive functioning, optimizing the ability to concentrate, and increasing overall worker satisfaction.”⁷

Finally, reading room placement in the overall design of a radiology department or hospital can have a substantial impact on the number and quality of your consultations with providers. At New York University Langone Medical Center, integrating a reading room into the urologic oncology clinic resulted in an extremely high level of provider satisfaction, with more than 90% of consultations having “benefitted patient care,” even when only manned three hours per day.⁸

We radiologists and administrators need to rethink the role of the reading room in the Imaging 3.0 era. According to Woojin Kim, MD, co-founder and Director of Innovation at Montage Healthcare Solutions and former Director of the Center for

Translational Imaging Informatics at the University of Pennsylvania, a “well-designed reading room is no longer enough. It has to be located in a place that can allow the radiologists to demonstrate their value better The layout cannot simply be all about the radiologists, but should also take into account the referring providers.”⁹ Kim goes on to say that, “too often people design radiology reading rooms as an afterthought. Even for a brand new building with a new radiology area, the radiology reading room is the last thing to be considered in the overall design process. When you build a new house, you don't wait until the blueprint is nearly completed and then decide to pick an odd-shaped corner space somewhere and designate that area as the master bedroom. Yet, I have seen this happen time after time—even with new construction.”

Fellow radiologists, I implore you: Stand up for your health, invest in the highest-quality task chairs, take care of your eyes, optimize your environment, and help demonstrate the added value you bring to patient care by strategic reading room placement whenever possible.

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