

Artificial Intelligence Is Here to Stay: Benefits and Risks

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Artificial intelligence (AI) is no longer a promise for the future: it is an everyday reality in medical practice. It is integrated into electronic health records, diagnostic support systems, and conversational assistants.

The question today is not whether we should use it, but how to use it responsibly.

In information management, AI makes it possible to process volumes of data that exceed human capacity. It can reduce clinical documentation time by 20-30% and assist in diagnostic decision-making.¹

However, these systems are probabilistic, not infallible. They can generate errors and biases and produce opaque decisions. The abundance of information calls for rigorous quality control and validation of AI-generated content.

In medical education, AI offers simulations of complex scenarios and personalized learning. It can generate diagnoses, interventions, and assessments that students must then analyze, correct, and justify.

However, it also introduces a documented risk: the erosion of skills when reliance on technology precedes independent reasoning. Physicians in training may come to rely on AI before fully developing their core competencies, leaving them without a solid foundation if the technology fails and limiting the learning experiences needed to develop clinical intuition and sound judgment (Figure).

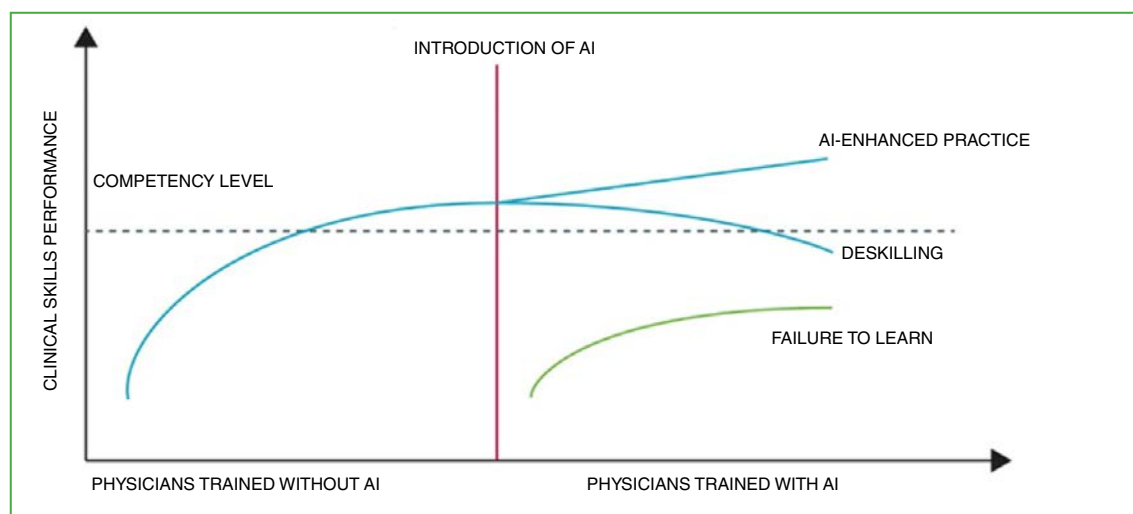


Figure. Clinical skills vs. AI performance. Modified from Berzin TM, Topol EJ. Preserving clinical skills in the age of AI assistance. *Lancet* 2025;406:1719-21. [https://doi.org/10.1016/S0140-6736\(25\)02075-6](https://doi.org/10.1016/S0140-6736(25)02075-6)

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These risks can be mitigated if AI is used only after physicians have made and recorded their own observations. These “sessions” should be repeated systematically and periodically even after basic training has been completed, just as pilots undergo recurrent flight simulator training.²

AI should be used after independent clinical analysis, not before.

In the physician-patient relationship, AI is changing expectations. Many patients arrive at the consultation with algorithm-generated diagnoses expressed with an air of certainty. Others arrive with treatments suggested by a system that does not disclose the level of evidence supporting them.

This apparent certainty gives the system an authority that people perceive as trustworthy. Apparent coherence can prevail over evidence.³

The challenge is not to compete with technology, but to strengthen clinical listening: the *escuchatorio*, the practice of truly listening to the patient. When the healthcare system does not provide enough time for listening, patients seek answers from algorithms that are available 24/7.

The implementation of voice-based communication that allows AI to participate as an interlocutor during the consultation continues to advance. Conversational AI promises to alleviate the administrative burden, but it introduces risks related to the accurate interpretation of language and the secondary use of clinical data.⁴

At the ethical level, crucial questions arise:

- **Who is responsible for an AI-assisted error?**
- **How is privacy protected?**
- **Should the use of AI be included in informed consent?**⁵
- **Could failure to use AI be considered negligence if it becomes standard?**

Conclusion

The conclusion is clear: AI does not replace the physician, but it does redefine the physician's responsibility. Integrating it critically, with continuous human oversight and appropriate regulation, is the challenge facing our generation of medical professionals. The greatest risk: confusing algorithmic coherence with scientific evidence.

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