



Supplementary material

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Supplement to: PL Lam, D Fenn, EH Chan, et al. Improving breast cancer detection in screening mammography with artificial intelligence assistance: a multi-reader retrospective study. Hong Kong J Radiol. 2026;29:Epub 26 Feb 2026. <https://doi.org/10.12809/hkjr2417896>.

Supplementary Table. Diagnostic accuracies in screening mammograms with and without artificial intelligence assistance.*

Breast radiologists (n = 9)				
	Without AI assistance	With AI assistance	Difference	p Value
Sensitivity	88.3% (80.3%-96.3%)	91.7% (85.4%-97.9%)	3.4% (1.4%-8.2%)	0.155
Specificity	87.6% (83.2%-92.1%)	92.6% (88.4%-96.9%)	5.0% (2.6%-7.4%)	< 0.001
General radiologists (n = 7)				
	Without AI-assistance	With AI-assistance	Difference	p Value
Sensitivity	54.0% (19.4%-88.6%)	66.7% (33.6%-99.7%)	12.7% (5.6%-19.8%)	< 0.001
Specificity	92.9% (87.3%-98.4%)	96.4% (93.0%-99.9%)	3.6% (1.0%-8.1%)	0.119
All radiologists (n = 16)				
	Without AI assistance	With AI assistance	Difference	p Value
Sensitivity	73.3% (56.3%-90.2%)	80.7% (65.8%-95.6%)	7.5% (2.1%-12.8%)	0.007
Specificity	89.9% (86.3%-93.6%)	94.3% (91.3%-97.3%)	4.4% (1.8%-6.9%)	< 0.001
Breast radiologists versus general radiologists with and without AI assistance				
	Breast radiologists (n = 9)	General radiologists (n = 7)	p Value	
Sensitivity without AI assistance	88.3% (80.3%-96.3%)	54.0% (19.4%-88.6%)	0.017	
Specificity without AI assistance	87.6% (83.2%-92.1%)	92.9% (87.3%-98.4%)	0.051	
Sensitivity with AI assistance	91.7% (85.4%-97.9%)	66.7% (33.6%-99.7%)	0.054	
Specificity with AI assistance	92.6% (88.4%-96.9%)	96.4% (93.0%-99.9%)	0.110	

Abbreviation: AI = artificial intelligence.

* Data are shown as mean (95% confidence interval).