# CURRICULUM VITAE

## PERSONAL DATA

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| **Name** | Maha Algarawi |
| **Nationality** | Saudi |
| **Position** | Assistent Professor |
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## EDUCATION

| Year | Academic Degree | Institution |
|---|---|---|
| 2008 | Bachelor | King Saud University |
| 2013 | Master | King Saud University |
| 2022 | Ph.D | University of California Irvine |
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## WORK EXPERIENCE

| Period | Position | Address |
|---|---|---|
| 2009 | Demonstrator | Physics department, Imam Mohamed bin Saud University. |
| 2014 | Lecturer | Physics department, Imam Mohamed bin Saud University. |
| 2022 | Assistent Professor | Physics department, Imam Mohamed bin Saud University. |
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## RESEARCH INTERESTS

Medical Physics

## PUBLICATIONS

Nouizi, F., **Algarawi, M**., Erkol, H., & Gulsen, G. (2023, March). Multiwavelength photo-magnetic imaging: a novel high-resolution optical molecular imaging modality (Conference Presentation). In *Multimodal Biomedical Imaging XVIII* (p. PC1237109). SPIE.

Nouizi, F., Cho, J., **Algarawi, M**., Kim, C. S., & Gulsen, G. (2022). Application of a wavelength-swept laser for spectrally resolved wide-field near-infrared fluorescence imaging. *Optics Continuum*, *1*(8), 1768-1776

Nouizi, F., **Algarawi, M**., Erkol, H., Luk, A., & Gulsen, G. (2022, March). Photo-magnetic imaging: a new functional imaging modality for more accurate photothermal therapy planning. In *Optical Methods for Tumor Treatment and Detection: Mechanisms and Techniques in Photodynamic and Photobiomodulation Therapy XXX* (Vol. 11940, pp. 28-34). SPIE.

Nouizi, F., **Algarawi, M**., Erkol, H., Luk, A., & Gulsen, G. (2021). Multiwavelength photo-magnetic imaging algorithm improved for direct chromophore concentration recovery using spectral constraints. *Applied Optics*, *60*(35), 10855-10861.

**Algarawi, M**., Erkol, H., Luk, A., Ha, S., Burcin Unlu, M., Gulsen, G., & Nouizi, F. (2021). Multi-Wavelength Photo-Magnetic Imaging System for Photothermal Therapy Guidance. *Lasers in surgery and medicine*, *53*(5), 713-721

Erkol, H., Yelken, S. Z., **Algarawi, M.**, Gulsen, G., & Nouizi, F. (2020). Validation of a comprehensive analytical model for photothermal therapy planning in a layered medium with gold nanoparticles. *International Journal of Heat and Mass Transfer*, *163*, 120438.

**Algarawi, M**., Erkol, H., Luk, A., Ha, S., Ünlü, M. B., Gulsen, G., & Nouizi, F. (2020). Resolving tissue chromophore concentration at MRI resolution using multi-wavelength photo-magnetic imaging. *Biomedical Optics Express*, *11*(8), 4244-4254

Mehrabi, M., Nouizi, F., **Algarawi, M**., Kwong, T. C., Erkol, H., Sampathkumaran, U., & Gulsen, G. (2019, March). CCD-based temperature modulated fluorescence tomography. In *Optical Tomography and Spectroscopy of Tissue XIII* (Vol. 10874, pp. 111-118). SPIE.

**Algarawi, M**., Nouizi, F., Luk, A., Mehrabi, M., Erkol, H., Ünlü, M. B., ... & Ha, S. (2019). High-resolution chromophore concentration recovery using multi-wavelength photo-magnetic imaging. *Multimodal Biomedical Imaging XIV*, *10871*, 36-43.

Nouizi, F., Erkol, H., Luk, A., **Algarawi, M.**, Mehrabi, M., & Gulsen, G. (2018, April). Multi-wavelengths photo magnetic imaging. In *Clinical and Translational Biophotonics* (pp. JW3A-45). Optica Publishing Group.

Erkol, H., Nouizi, F., Luk, A., Mehrabi, M., **Algarawi, M**., Unlu, M. B., & Gulsen, G. (2018, April). A comprehensive analytical based computational approach for laser induced heat in a heterogeneous turbid medium. In *Clinical and Translational Biophotonics* (pp. JTh3A-16). Optica Publishing Group.