High-speed polarization sensitive optical coherence tomography scan engine based on Fourier domain mode locked laser: erratum

Marco Bonesi,[1] Harald Sattmann,[1] Teresa Torzicky,[1] Stefan Zotter,[1] Bernhard Baumann,[1] Michael Pircher,[1] Erich Götzinger,[1] Christoph Eigenwillig,[2] Wolfgang Wieser,[2] Robert Huber,[2] and Christoph K. Hitzenberger[1,*]

[1]*Center for Medical Physics and Biomedical Engineering, Medical University of Vienna, A-1090 Vienna, Austria*
[2]*Lehrstuhl für BioMolekulare Optik, Fakultät für Physik, Ludwig-Maximilians-Universität München, D-80538 München, Germany*
*christoph.hitzenberger@meduniwien.ac.at

Abstract: We recently reported on a new swept source polarization sensitive optical coherence tomography system and its application to skin imaging [Biomed. Opt. Express **3**, 2987 (2012)]. In some of the tomographic images, two skin layers were labeled wrongly (interchanged). We present figures with corrected labeling.

© 2013 Optical Society of America

OCIS codes: (170.4500) Optical coherence tomography; (230.5440) Polarization-selective devices; (170.4580) Optical diagnostics for medicine.

References and links

1. M. Bonesi, H. Sattmann, T. Torzicky, S. Zotter, B. Baumann, M. Pircher, E. Götzinger, C. Eigenwillig, W. Wieser, R. Huber, and C. K. Hitzenberger, "High-speed polarization sensitive optical coherence tomography scan engine based on Fourier domain mode locked laser," Biomed. Opt. Express **3**(11), 2987–3000 (2012).

We recently reported on a new swept source polarization sensitive optical coherence tomography system and its application to skin imaging [1]. In three of the tomographic images of that paper (Figs. 4, 5, and 6) two skin layers were wrongly labeled: epidermis (E) and dermis (D) were interchanged. We replace these figures by the correctly labeled figures, Fig. 1, Fig. 2, and Fig. 3, respectively. The text sections of the paper are not affected by that error.
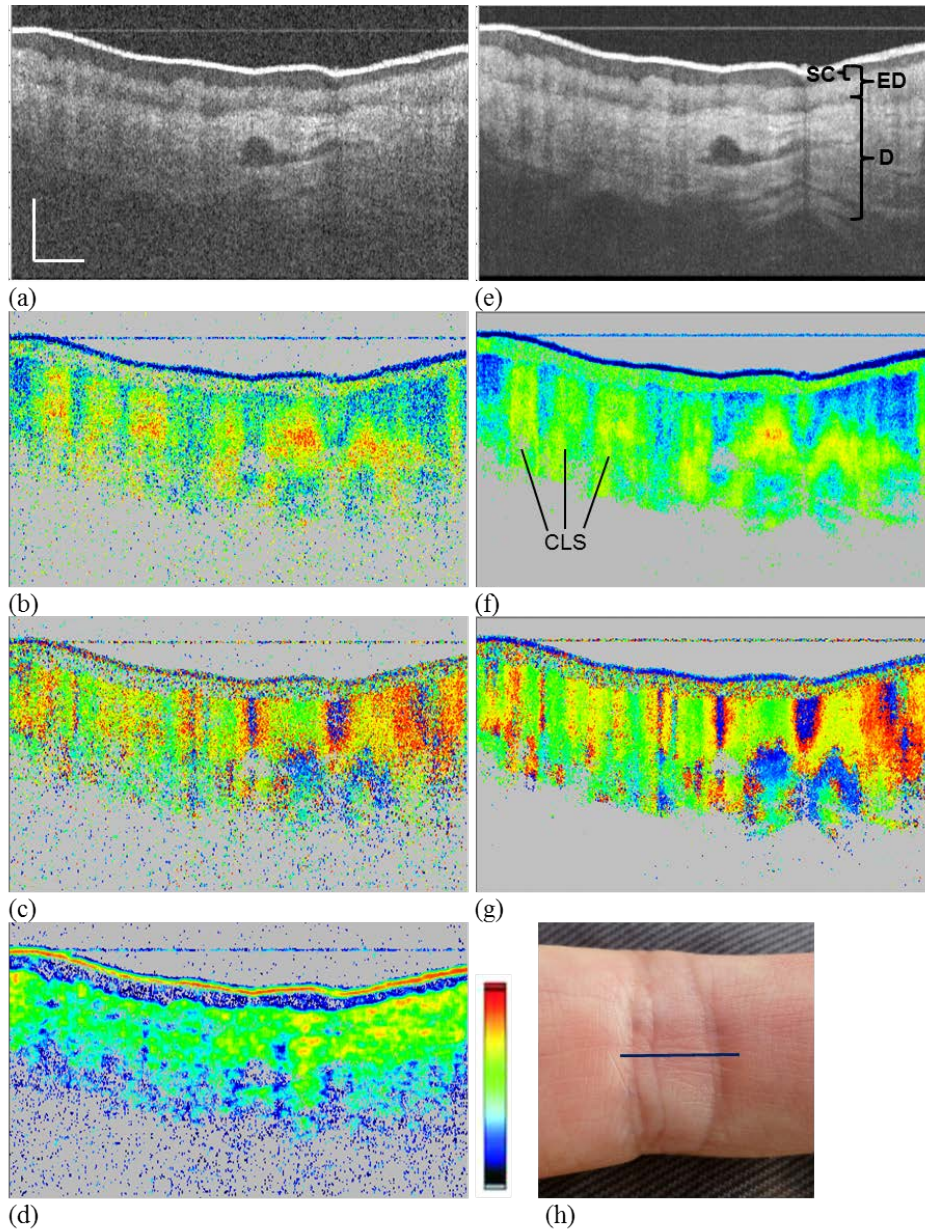
Fig. 1. (Replacement for Fig. 4 in original manuscript [1]) PS-OCT images of human skin. Proximal interphalangeal joint of middle finger (PIP) region. (a)–(d) single frame images; (e)–(g) average of 15 frames. (a), (e) reflectivity (log scale); (b), (f) retardation (color scale: 0–90°); (c), (g) axis orientation (color scale: −90–+90°); (d) DOPU (color scale: 0–1), 2D DOPU window (12(x) x 6(z) pixels or 55 x 38 µm^2); (h) photo of imaged area, line shows approximate B-scan position. Scale bar dimensions: 0.5 mm (x: geometrical distance; z: optical distance). SC, stratum corneum; ED, epidermis; D, dermis; CLS, "column" like structure.
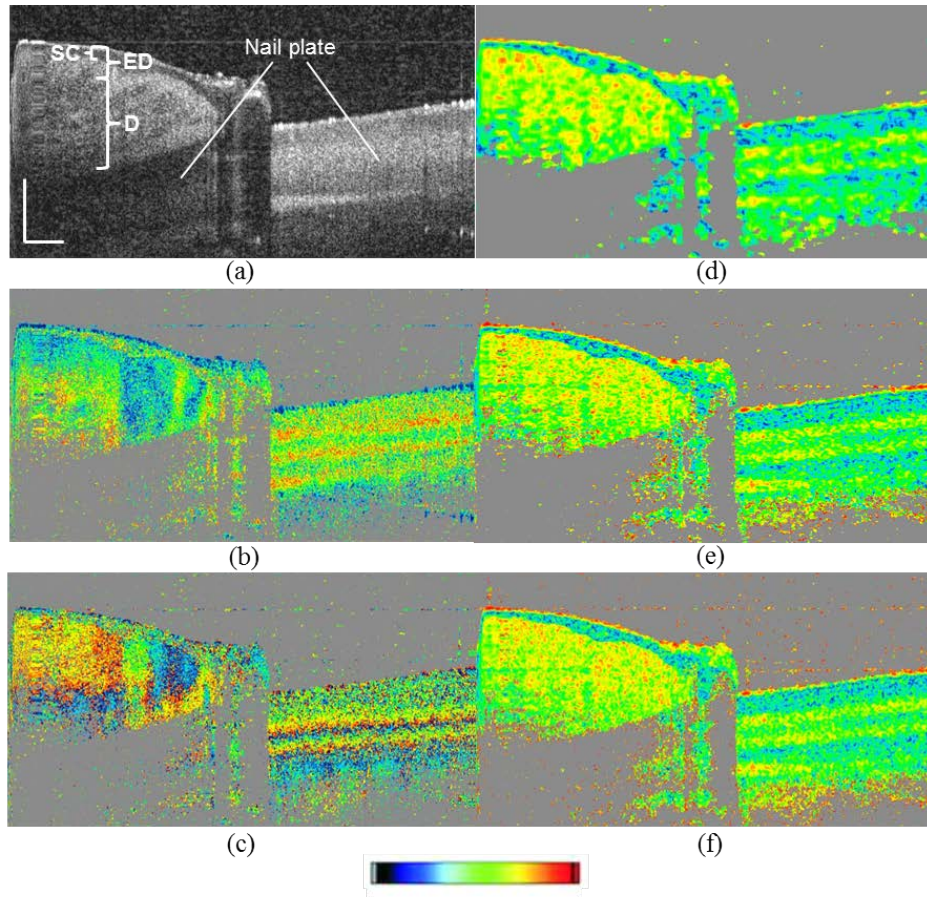
Fig. 2. (Replacement for Fig. 5 in original manuscript [1]) PS-OCT images of human skin. Nail fold region. (a) reflectivity (log scale); (b) retardation (color scale: 0–90°); (c) axis orientation (color scale: −90–+90°); (d)–(f) DOPU (color scale: 0–1). (d) 2D DOPU window (16(x) x 7(z) pixels or 96 x 44 μm^2); (e) 3D DOPU window (8(x) x 4(y) x 3(z) pixels or 48 x 48 x 19 μm^3); (f) 3D DOPU window (5(x) x 5(y) x 3(z) pixels or 30 x 60 x 19 μm^3). Scale bar dimensions: 0.5 mm (x: geometrical distance; z: optical distance). SC, stratum corneum;, ED, epidermis; D, dermis.
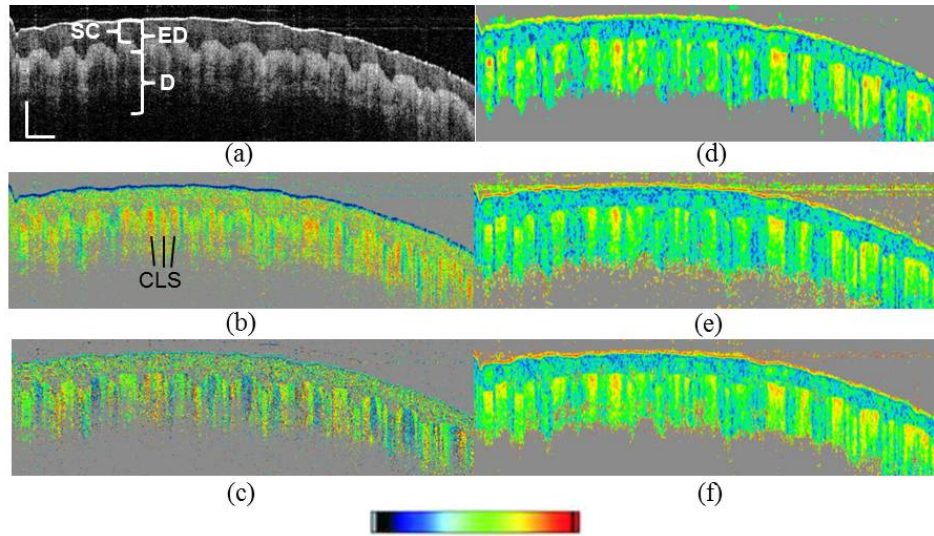
Fig. 3. (Replacement for Fig. 6 in original manuscript [1]) PS-OCT images of human skin. Fingertip region. (a) reflectivity (log scale); (b) retardation (color scale: 0–90°); (c) axis orientation (color scale: −90–+90°); (d)–(f) DOPU (color scale: 0–1). (d) 2D DOPU window (6(x) x 12(z) pixels or 48 x 75 μm^2); (e) 3D DOPU window (4(x) x 4(y) x 6(z) pixels or 32 x 32 x 38 μm^3); (f) 3D DOPU window (2(x) x 6(y) x 6(z) pixels or 16 x 48 x 38 μm^3). Scale bar dimensions: 0.5 mm (x: geometrical distance; z: optical distance). SC, stratum corneum;, ED, epidermis; D, dermis; CLS, "column" like structure.