

1. Record Nr.	UNINA9910349558103321
Titolo	Fluorescence Lifetime Imaging Ophthalmoscopy // edited by Martin Zinkernagel, Chantal Dysli
Pubbl/distr/stampa	Cham : , : Springer International Publishing : , : Imprint : Springer, , 2019
ISBN	3-030-22878-9
Edizione	[1st ed. 2019.]
Descrizione fisica	1 online resource (123 pages)
Disciplina	617.70028 617.71
Soggetti	Ophthalmology Radiology Biomedical engineering Imaging / Radiology Biomedical Engineering/Biotechnology
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di contenuto	Fluorescence lifetime imaging microscopy (FLIM) -- FLIO technique and principles -- Imaging and analysis protocols -- Origin of Retinal fluorophores -- FLIO in the healthy eye -- FLIO in retinal diseases (Age-related macular degeneration (Drusen, early stage, geographic atrophy), Diabetic retinopathy, Retinal artery occlusion, Central serous chorioretinopathy, Macular teleangiectasia, Hereditary retinal diseases (Stargardt, Choroideremia, Retinitis pigmentosa).
Sommario/riassunto	This book focuses on the emerging non-invasive imaging technique of Fluorescence Lifetime Imaging Ophthalmoscopy (FLIO). FLIO reveals unique information on retinal diseases, ranging from age-related macular degeneration and vascular diseases to hereditary retinal dystrophies. Fluorescence lifetimes enable the evaluation of disease progression before irreversible structural changes occur. The image acquisition is suitable for diagnostic purposes and follow-up examinations to investigate the natural course of disease, and to monitor the effects of possible therapies. This book fills the gap between available literature and gives state-of-the-art guidance on the

principles of the FLIO technique, image acquisition, and data analysis. Written by a team of expert leaders within this field, this book will be relevant for scientists and clinicians with an interest in ophthalmoscopy.
