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Nota di contenuto	PART I) SPECIALISTS' PERSPECTIVES TO HYBRID CARDIAC IMAGING -- Chapter 1) Hybrid Cardiac Imaging for the Clinical Cardiologist -- Chapter 2) Hybrid Cardiac Imaging for the Cardiologist with Expertise in Echocardiography -- Chapter 3) Hybrid Cardiac Imaging for the Specialist with Expertise in Cardiac Magnetic Resonance -- Chapter 4) Hybrid Imaging Using Single Photon Emission Computed Tomography -- Chapter 5) Hybrid Cardiac Imaging for the Specialist with Expertise in Computed Tomography -- Chapter 6) Hybrid Cardiac Imaging for the Invasive Cardiologist -- Chapter 7) Hybrid Cardiac Imaging for the Interventional Cardiologist -- PART II) HYBRID IMAGING IN CLINICAL PRACTICE -- Chapter 8) Systematic Review of Hybrid Cardiac Imaging

-- Chapter 9) Hybrid Cardiac Viability Assessment -- Chapter 10) Hybrid Cardiac Imaging in Clinical Practice: From Diagnosis to Prognosis and Management -- Chapter 11) Clinical Cases of Hybrid Cardiac Imaging -- Chapter 12) Hybrid Cardiac Imaging: The Role of Machine Learning and Artificial Intelligence.

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## Sommario/riassunto

Performing any diagnostic test in medicine is always a matter of trying to get the condition of the patient diagnosed properly with the least effort, exposure, discomfort and at the same time with the lowest possible error probability. Pre-test probability is helpful but often imprecise, effectively overestimating the patient's risk profile. In a broader prevention objective, the phases of a disease, its onset, progression, and complications must be taken into account. The negative predictive value, which is so important, has in turn its main limitation in identifying the healthy patient, that is, the one who does not belong to any cluster of patients in which we would act in terms of prevention. In coronary syndromes, the goal is instead to evaluate coronary heart disease, from mild to more extensive and significant forms. For this purpose, it is necessary to use parameters that investigate different and complementary aspects: stenosis, ischemia, the morphology of the atherosclerotic plaque, metabolic processes, in particular vitality and apoptosis, the presence of inflammatory processes. The possibility, already present thanks to Hybrid Imaging, of 'joining' exams that study different aspects, will allow the patient to be increasingly characterized not only from a diagnostic point of view but also from a prognostic and personalized therapeutic choice.

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