

1. Record Nr.	UNINA9910483950103321
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Titolo	Microfluidics for assisted reproduction in animals / / Vinod Kumar Yata
Pubbl/distr/stampa	Singapore : , : Springer, , [2021] ©2021
ISBN	981-334-876-3
Descrizione fisica	1 online resource (120 pages)
Disciplina	636.08245
Soggetti	Artificial insemination Embryo transplantation Microfluidics Inseminació artificial Transferència d'embrions Microfluídica Llibres electrònics
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di contenuto	<p>Intro -- Foreword -- Preface -- Acknowledgements -- About the Book -- Contents -- About the Author -- 1: Introduction -- 1.1 What Is Microfluidics? -- 1.2 History of Microfluidics -- 1.3 Applications of Microfluidics -- 1.4 Assisted Reproduction in Animals -- 1.4.1 Sperm Preparation for ART -- 1.4.2 Role of Cryopreservation in ART -- 1.4.3 ART in Animal Production -- 1.5 Conclusions -- References -- 2: Principles, Materials, and Fabrication Methods of Microfluidics -- 2.1 Introduction -- 2.2 Fundamentals of Microfluidics -- 2.2.1 Fluid Flow -- 2.2.2 Diffusion -- 2.2.3 Surface Effects -- 2.2.4 Migration by Electric Force -- 2.3 Materials for Microfluidic Chip Fabrication -- 2.3.1 Silicon and Glass -- 2.3.2 Elastomers -- 2.3.3 Thermosets -- 2.3.4 Thermoplastics -- 2.3.5 Hydrogels -- 2.3.6 Paper -- 2.4 Fabrication methods -- 2.4.1 Typical fabrication techniques -- 2.4.1.1 Laser photoablation or Laser micromachining -- 2.4.1.2 Lithography -- 2.4.1.3 Soft Lithography -- Casting -- Embossing -- Injection Molding -- 2.4.1.4 3D Printing -- 2.4.2 Nanofabrication -- 2.4.3 Droplet and Digital Microfluidics -- 2.5 Conclusions -- References -- 3:</p>

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