1. Record Nr. UNINA9910453715103321 Reproductive biology and phylogeny of birds . Part B: sexual selection, **Titolo** behavior, conservation, embryology and genetics // edited by Barrie G M Jamieson Boca Raton, FL:,: CRC Press, an imprint of Taylor and Francis,, 2007 Pubbl/distr/stampa **ISBN** 0-429-07600-2 1-4822-8051-5 1-281-82758-4 9786611827588 1-57808-591-8 Edizione [First edition.] Descrizione fisica 1 online resource (543 p.) Reproductive biology and phylogeny ; ; v. 6B Collana Disciplina 598 Soggetti Birds - Phylogeny Birds - Reproduction Electronic books. Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Description based upon print version of record. Note generali Includes bibliographical references and index. Nota di bibliografia ""Preface to the Series""; ""Preface to this Volume""; ""Contents""; ""1. Nota di contenuto Sexual Selection of Ultraviolet and Structural Color Signals "": ""1.1 INTRODUCTION"": ""1.2 AVIAN UV COLOR VISION "": ""1.3 UV/STRUCTURAL COLOR PRODUCTION "": ""1.3.1 Iridescent Plumage "": ""1.3.2 Non-iridescent Plumage ""; ""1.3.3 White Plumage ""; ""1.3.4 UVreflecting Pigmented Plumage ""; ""1.3.5 Fluorescent Plumage""; ""1.4 MEASURING UV AND STRUCTURAL SEXUAL SIGNALS ""; ""1.5 SEXUAL SELECTION AND UV/STRUCTURAL SIGNALS ""; ""1.5.1 Avian UV Role Models ""; ""1.5.1.1 Zebra finches ""; ""1.5.1.2 Blue tits "" ""1.5.1.3 Bluethroats"""1.5.1.4 Recent UV/structural studies ""; ""1.6 SEXUAL SELECTION AND STRUCTURAL SIGNALS ""; ""1.7 SEXUAL SELECTION AND FLUORESCENT SIGNALS ""; ""1.8 WHY ARE UV/STRUCTURAL SIGNALS USED IN SEXUAL COMMUNICATION? ""; ""1.8.1 Private Signaling Channel ""; ""1.8.2 Light and Habitat Contrast "": ""1.8.3 Receiver Biases for UV-Reflective Signals ""; ""1.8.4 Signals as

Amplifiers of Mate Quality ""; ""1.8.5 Signals as Indicators of Mate

Quality ""; ""1.9 FUTURE CHALLENGES ""; ""1.10 ACKNOWLEDGMENTS""; ""1.11 LITERATURE CITED "" ""2. Melanins and Carotenoids as Feather Colorants and Signals """"2.1 INTRODUCTION""; ""2.2 MECHANISMS OF PRODUCTION OF MELANIN AND CAROTENOID COLORATION ""; ""2.3 GENETIC AND ENVIRONMENTAL CONTROL ""; ""2.3.1 Genetic Control of Color Traits ""; ""2.3.2 Environmental Effects and the Information Content of Ornamental Coloration ""; ""2.3.2.1 Pigment access ""; ""2.3.2.2 Parasites""; ""2.3.2.3 Nutrition""; ""2.3.2.4 Social status and color ""; ""2.3.3 The Information Content of Pigment-based Color Signals ""; ""2.3.3.1 Morphs ""; ""2.3.3.2 Continuous variation in color display"" ""2.3.3.3 Degree of detail in single and multiple pigment signals """"2.4 THE FUNCTION OF CAROTENOID AND MELANIN COLORATION "": ""2.5 BENEFITS TO ASSESSMENT OF PIGMENT DISPLAYS ""; ""2.5.1 Mate Choice ""; ""2.5.1.1 Direct benefits""; ""2.5.1.2 Good genes ""; ""2.5.1.3 Reproductive success ""; ""2.5.2 Status Signaling and Receiver Benefits ""; ""2.6 CHAPTER SUMMARY ""; ""2.7 ACKNOWLEDGMENTS ""; ""2.8 LITERATURE CITED""; ""3. Odors and Chemical Signaling""; ""3.1 INTRODUCTION"": ""3.2 ODORS DERIVED FROM THE ENVIRONMENT"": ""3.2.1 Plants ""; ""3.2.2 Heterospecific Animals"" ""3.3 ODORS DERIVED FROM BIRDS """"3.3.1 Odors, Chemical Signals and Pheromones""; ""3.3.2 Production of Avian Odors ""; ""3.4 SOCIAL CONTEXTS OF AVIAN ODORS""; ""3.4.1 Using Avian-derived Odorsto Locate Home ""; ""3.4.2 Discrimination of Own-Nest Odor "": ""3.4.3 Discrimination of Self, Conspecific and Mate Odor ""; ""3.4.4 Chicks, Parenting and Odor Learning ""; ""3.4.5 Odors Linked with Courtship or Other Displays""; ""3.5 IMPLICATIONS OF AVIAN ODOR AS A SIGNAL ""; ""3.5.1 A General Role for Honest Odor Signals in Birds?"" ""3.5.2 Prospects for Odors Related to Kin Selection and Mating System

## Sommario/riassunto

The second part of volume 6 discusses sexual selection of ultraviolet and structural signals; melanins and carotenoids as feather colorants and signals; sexual selection and auditory signaling; odors and chemical signaling; sexual dimorphism; sexual selection, signal selection and the handicap principle; courtship and copulation; sexual conflict and its implications for fitness; intra- and extra-pair paternity; parental care (including cooperative breeding); brood parasitism in birds; applications of reproductive biology to bird conservation and population management; embryogenesis and development; molecular genetics of avian sex determination and gonadal development. Many new illustrations are provided throughout the volume.