

The New Walford

Guide to Reference Resources

Volume 1

Science, Technology and Medicine

Editor-in-Chief

Ray Lester BSc PhD FCLIP FRSA

Contents

Preface	vii
Quick-start guide	viii
Editor and subject specialists	x
50 good websites to try first	xiii
Introduction	xv

SCIENCE, TECHNOLOGY & MEDICINE: GENERIC RESOURCES 3

SCIENCE 47

Mathematics 60

Calculus, Analysis & Differential Equations	71
Discrete Mathematics	73
Geometry & Topology	77
Statistical & Numerical Analysis	78

Physics & Astronomy 84

Astronomy	89
Astrophysics & Cosmology	96
Modern Physics	104
Nuclear & Particle Physics	106
Optical & Wave Physics	108

Earth Sciences 112

Geochemistry	120
Geology	123
Geomorphology	133
Geophysics	139
Hydrology	143
Meteorology & Climatology	148
Mineralogy	161
Oceanography	168
Palaeontology	175
Petrology	184
Spatial Technologies	188

Chemistry 201

Inorganic Chemistry	212
Laboratory Tools & Techniques	214
Organic Chemistry	222
Physical Chemistry	225

Biological Sciences 229

Animal Behaviour	240
Biochemistry & Biophysics	243
Biodiversity & Conservation	250
Botany	260
Cell Biology	269
Ecology	272
Entomology	280
Evolution & Development	286
Genetics, Genomics & Bioinformatics	290
Marine & Freshwater Biology	299
Microbiology & Virology	308
Mycology	313

Ornithology	316
Parasitology	321
Protistology	323
Systematics & Taxonomy	326
Zoology	329

Agriculture, Forestry, Fisheries & Food 336

Agriculture	341
Crops & Horticulture	349
Fisheries	354
Food Science & Technology	356
Forestry	362
Livestock	371
Plant & Crop Protection	373
Soil Science	376
Veterinary Science	379

MEDICINE 387

Pre-clinical Sciences 399

Anatomy, Physiology & Pathology	400
Biomedical Sciences	404
Human Genetics	408
Medical Technology	412
Pharmacology & Pharmacy	416

Clinical Medicine 426

Cardiovascular & Respiratory System	432
Dentistry	433
Dermatology	436
Digestive System	437
Endocrine System	438
Geriatrics & Chronic Diseases	440
Immune System	442
Infectious Diseases	444
Musculoskeletal System	446
Nervous System	448
Obstetrics & Gynaecology	452
Oncology	454
Ophthalmology	456
Otorhinolaryngology	458
Paediatrics	459
Psychiatry	460
Surgery	464

Health 466

Complementary & Alternative Medicine	472
Environmental & Occupational Health	475
Family & Personal Health	485
Hospitals & Other Health Facilities	487
Nursing, Midwifery & Allied Health	489
Nutrition	493
Public Health & Preventive Medicine	496
Reproductive Medicine & Health	500
Sports & Exercise Medicine	504

TECHNOLOGY 509

Natural Resources & Energy 523

- Mining & Minerals Processing 529
- Nuclear Energy 534
- Oil, Natural Gas & Coal 537
- Renewable & Alternative Energy 540

Engineering 545

- Aeronautical & Aerospace Engineering 552
- Automotive & Agricultural Engineering 562
- Biotechnology 566
- Chemical Engineering & Chemical Technology 572
- Civil Engineering 582
- Construction & Building 596
- Design 603
- Electrical & Electronic Engineering 608
- Environmental Engineering 622
- Manufacturing Engineering 635
- Marine Engineering & Naval Architecture 644

- Materials Science & Engineering 647
- Mechanical Engineering 657
- Microengineering & Nanotechnology 668

Information & Communication Technology 672

- Computer & Networking Hardware 679
- Computer Software & Programming 682
- Digital Multimedia 688
- Information System Security 690
- Telecommunications 693
- Web & Internet 699

TOOLS FOR INFORMATION PROFESSIONALS 705

INDEXES

Topic Index 727

Title/Author Index 737

The New Walford

Guide to Reference Resources

Volume 2

Social Sciences

Contents

Preface vii

Quick-start guide viii

Editorial Board and Subject Specialists x

Introduction xii

SOCIAL SCIENCES: GENERIC RESOURCES 3

PSYCHOLOGY, SOCIOLOGY & SOCIAL WORK 23

Psychology 25

- History & Theories of Psychology 30
- Psychoanalysis 32
- Research Methods in Psychology 34
- Psychological Testing & Assessment 35
- Biological Psychology 39
- Cognitive Psychology & Cognitive Science 41
- Developmental Psychology 42
- Personality & Individual Differences 45
- Social Psychology 46
- Abnormal & Clinical Psychology 48
- Health Psychology 51
- Industrial & Organizational Psychology 53
- Educational Psychology 54
- Forensic Psychology 55
- Parapsychology 56

Sociology 59

- Sociological Theory & Methodology 64
 - Sociologists 64
 - Sociological Theory* 66
- Social Structure, Organization & Control 68
 - Social Structure* 68
 - Social Control* 70
- Sociology of Population, Family & Gender 73
 - Sociology of Age-related Groups* 73
 - Sociology of the Family* 74
 - Sociology of Gender & Sexuality* 75
- Sociology of Race & Ethnicity 80
- Sociology of the Environment 82
- Sociology of Economics & Work 84
 - Economic & Production Systems* 84
 - Sociology of Work, Leisure & Sport* 85
- Sociology of Culture, Communication & the Media 87
 - Communication Studies* 87
 - Sociology of the Media* 88
 - Communications Technology & New Media* 88
- Sociology of Religion 90
- Sociology of Education 91
- Sociology of Health & Illness 93

Social Work & Social Welfare 95

- Social Work Education & Training 103
- Social Service Users 105
 - Alcohol & Drug Misuse* 105
 - Disabilities* 107
 - Older People* 112

Black & Minority Ethnic People 115

Children, Young People & Families 117

Mental Health & Social Work 122

POLITICS, GOVERNMENT & LAW 127

Politics 129

- Political Science 129
- Political Theory 139
- Political Systems 143
 - Types of Political System or Government* 144
 - Regime Change* 147
- Political Communication 148
 - Types of Communication* 149
- Elections 151
- International Relations 158
 - International Relations Theories & Systems* 161
 - Diplomacy* 162
 - Foreign Policy* 163
 - International Migration & Colonization* 166
 - International Organizations* 169
- International Security & Conflict Resolution 177
 - Current International Conflicts & Wars* 181
 - Peacekeeping, Peace Studies & Disarmament* 192
 - Terrorism* 200
- Parliaments 204
 - Transnational Parliamentary Bodies* 204
 - National Parliaments* 206
 - Regional & Devolved Parliaments* 209
 - Members of Parliament* 211
- Political Parties 212
 - National Political Parties* 212
 - Types of Political Party* 214

Government 219

- Central Institutions 219
 - Australia* 221
 - Canada* 221
 - European Union* 222
 - Guernsey* 222
 - Ireland* 222
 - Isle of Man* 223
 - Jersey* 223
 - New Zealand* 223
 - Northern Ireland* 223
 - Scotland* 224
 - United Kingdom* 224
 - United States* 226
 - Wales* 228
- State, Regional & Local Institutions 228
 - England* 229
 - Ireland* 230
 - Northern Ireland* 230
 - Scotland* 230
 - United Kingdom* 231
 - United Kingdom – Subordinate Jurisdictions* 232
 - Wales* 232

Law 233

- Jurisprudence 236
- Comparative Law 236
- Systems of Law 238
 - Civil Law 238
 - Common Law 239
 - Religious Legal Systems 239
 - Socialist Law 241
- Public International Law 242
 - Law of War & Peace 245
 - Laws of International Organizations 245
 - Laws of International Relations 248
 - Laws of Common Areas 252
 - Laws of Human Rights 255
 - Laws Concerning Individuals 258
 - Private International Law 259
 - Conflict Resolution Law 260
 - Business Law 262
 - Trade Law 264
 - Aviation Law 265
- National Jurisdictions 265
 - Australia 265
 - Canada 268
 - England 273
 - Guernsey 273
 - Irish Republic 274
 - Isle of Man 278
 - Jersey 279
 - New Zealand 280
 - Northern Ireland 283
 - Scotland 285
 - United Kingdom 289
 - United Kingdom – Subordinate Jurisdictions 296
 - United States 299
 - Wales 304

FINANCE, INDUSTRY & BUSINESS 307**Finance, Accountancy & Taxation 309**

- Finance 309
- Financial Markets 312
- Money Markets & Capital Markets 315
 - Commodity Markets 317
 - Derivative, Futures & Options Markets 318
- Financial Institutions 319
 - Banks & Other Lending Institutions 321
 - Venture Capital Companies 324
 - Investment Funds 326
 - Trusts & Charities 327
 - Pension Funds 328
- Financial Management 329
 - Investment Appraisal 331
 - Financial Risk 332
 - Portfolio Investment 334
 - Corporate Restructuring 335
 - Land & Property Finance 337
 - Personal Finance 340

- Accounting 342
 - Management Accounting 344
 - Financial Reporting 345
 - Auditing 347
- Taxation 348
 - Tax Law 350
 - Personal Taxation 351
 - Company Taxation 352

Industries & Utilities 353

- Aerospace Industry (Civilian) 357
- Agriculture, Horticulture, Fishing & Forestry 359
- Automotive Industry (Civilian) 360
- Chemicals & Plastics Industries 361
- Construction & Building Industries 362
- Cosmetics & Toiletries Industries 363
- Defence Industry 363
- Electronics & Electrical Industries 364
- Entertainment, Sport & Leisure Industries 365
- Engineering, Manufacturing, Metalworking & Woodworking 368
- Environmental Industry 369
- Extraction Industries 370
- Food, Beverages & Tobacco Industries 372
- Media, Publishing & Film Industries 373
- Paper & Packaging Industries 374
- Pharmaceutical, Healthcare & Biotechnology Industries 376
- Professions, Consulting & Service Industries 376
- Retail, Luxury Goods, Consumer Goods, Textiles, Clothing & Footwear Industries 377
- Shipbuilding Industry (Civilian) 379
- Tourism Industry 379
- Transport & Distribution Industries 380
- Utilities 382
 - Electricity & Gas 382
 - Telecommunications 383
 - Water & Sewage 383

Business & Management 385

- Management Development 391
- Management Activities 396
- The Enterprise 402
- Business Responsibility 414
- Marketing 419
- Advertising & PR 427
- Physical Distribution Management 434
- Operations & Technology Management 438
- Human Resource Management 443
- Decision Sciences 451

EDUCATION & SPORT 457**Education & Learning 459**

- Educational Theory 463
- Schools 466
- Further & Higher Education 469
- Lifelong Learning 473
- Inclusive Education 475

Sport 479

- Coaching & Performance 484
- Health Related Physical Activity 488
- International Competitions 491
- Physical Education 493
- Sociology & Philosophy of Sport 495
- Sports Activities 497
- Sports History 502
- Sports Industry 505
- Sports Law 508
- Sports Management & Policy 510
- Sports Nutrition 512
- Sports Participation 513
- Sports Psychology 517
- Sports Science 519

MEDIA & INFORMATION 523

Media & Communications 525

- Journalism 532
- News & The Press 537
- Radio, TV & Film 541
- Privacy, Freedom & Censorship 549
- Media Watchers & Activists 553
- Cyberculture 556

Information & Library Sciences 561

- Information Society 567
 - Information Literacy* 570
 - Information Policy* 573
 - Knowledge Management* 577

Knowledge Organization 579

- Cataloguing & Classification* 581
- Collection Development & Information Resource Management* 584
- Information Retrieval* 589

Libraries & Information Centres 590

- Children's & School Libraries* 591
- College & University Libraries* 593
- National Libraries* 594
- Public Libraries* 595
- Specialist Libraries* 597

Library Operations & Organization 598

- Information Products & Services* 599
- Library Administration & Management* 601
- Library Systems & Technology* 603

Records Management & Archives Administration 606

TOOLS FOR INFORMATION PROFESSIONALS 611

INDEXES

Topic Index 629

Title/Author Index 635