

# Personality, Individual Differences and Intelligence

Fifth Edition

John Maltby  
Liz Day  
Ann Macaskill

 Pearson

# **Personality, Individual Differences and Intelligence**



Pearson

At Pearson, we have a simple mission: to help people make more of their lives through learning.

We combine innovative learning technology with trusted content and educational expertise to provide engaging and effective learning experiences that serve people wherever and whenever they are learning.

From classroom to boardroom, our curriculum materials, digital learning tools and testing programmes help to educate millions of people worldwide – more than any other private enterprise.

Every day our work helps learning flourish, and wherever learning flourishes, so do people.

To learn more, please visit us at [www.pearson.com/uk](http://www.pearson.com/uk)



# Personality, Individual Differences and Intelligence

Fifth Edition

**John Maltby**  
University of Leicester

**Liz Day**  
Sheffield Hallam University

**Ann Macaskill**  
Sheffield Hallam University



Harlow, England • London • New York • Boston • San Francisco • Toronto • Sydney • Dubai • Singapore • Hong Kong  
Tokyo • Seoul • Taipei • New Delhi • Cape Town • São Paulo • Mexico City • Madrid • Amsterdam • Munich • Paris • Milan



## PEARSON EDUCATION LIMITED

KAO Two

KAO Park

Harlow CM17 9SR

United Kingdom

Tel: +44 (0)1279 623623

Web: [www.pearson.com/uk](http://www.pearson.com/uk)

---

First published 2007 (print)

Second edition published 2010 (print)

Third edition published 2013 (print and electronic)

Fourth edition published 2017 (print and electronic)

**Fifth edition published 2022 (print and electronic)**

© Pearson Education Limited 2007, 2010 (print)

© Pearson Education Limited 2013, 2017, 2022 (print and electronic)

The rights of John Maltby, Liz Day and Ann Macaskill to be identified as authors of this work have been asserted by them in accordance with the Copyright, Designs and Patents Act 1988.

The print publication is protected by copyright. Prior to any prohibited reproduction, storage in a retrieval system, distribution or transmission in any form or by any means, electronic, mechanical, recording or otherwise, permission should be obtained from the publisher or, where applicable, a licence permitting restricted copying in the United Kingdom should be obtained from the Copyright Licensing Agency Ltd, Barnard's Inn, 86 Fetter Lane, London EC4A 1EN.

The ePublication is protected by copyright and must not be copied, reproduced, transferred, distributed, leased, licensed or publicly performed or used in any way except as specifically permitted in writing by the publishers, as allowed under the terms and conditions under which it was purchased, or as strictly permitted by applicable copyright law. Any unauthorised distribution or use of this text may be a direct infringement of the authors' and the publisher's rights and those responsible may be liable in law accordingly.

Pearson Education is not responsible for the content of third-party internet sites.

ISBN: 978-1-292-31796-0 (print)

978-1-292-31802-8 (PDF)

978-1-292-31801-1 (EEB)

### British Library Cataloguing-in-Publication Data

A catalogue record for the print edition is available from the British Library

### Library of Congress Cataloging-in-Publication Data

Names: Maltby, John, 1969- author. | Day, Liz, author. | Macaskill, Ann, author.

Title: Personality, individual differences and intelligence / John Maltby,  
University of Leicester, Liz Day, Sheffield Hallam University, Ann  
Macaskill, Sheffield Hallam University.

Description: Fifth Edition. | Hoboken, NJ : Pearson, [2022] | Revised  
edition of the authors' Personality, individual differences and  
intelligence, [2017] | Includes bibliographical references and index. |  
Summary: "The second way that this text is organised is through level of  
study. We are aware that some psychology courses teach different topic  
areas in personality, intelligence and individual differences in  
different years (ranging from first year to final year). Therefore, we  
have organised each of the three parts of the text so that the later  
chapters in each part may be considered as more advanced topics of  
study. In this way, there is a developmental progression in the  
learning. This also means that the text should be useful across all the  
years of your degree" – Provided by publisher.

Identifiers: LCCN 2021058170 (print) | LCCN 2021058171 (ebook) | ISBN 9781292317960 (paperback) |  
ISBN 9781292318028 (pdf) | ISBN 9781292318011

Subjects: LCSH: Personality. | Personality and intelligence. | Individual differences.

Classification: LCC BF698.9.I6 M35 2022 (print) | LCC BF698.9.I6 (ebook) | DDC 155.2—dc23/  
eng/20220106

LC record available at <https://lcn.loc.gov/2021058170>

LC ebook record available at <https://lcn.loc.gov/2021058171>

10 9 8 7 6 5 4 3 2 1

22 21 20 19 18

Cover design: Kelly Miller

Cover image: Lovely Bird/Shutterstock

Print edition typeset in 9.5/12 pt Times LT Pro Roman by Straive

Printed in Slovakia by Neografia

NOTE THAT ANY PAGE CROSS REFERENCES REFER TO THE PRINT EDITION

## **Dedication**

For Liz





# BRIEF CONTENTS



About the Authors	xix		
Preface	xx		
Acknowledgements	xxv		
<b>PART 1</b> Personality and Individual Differences	1		
1 Personality Theory in Context	2		
2 The Basis of the Psychoanalytic Approach to Personality	23		
3 Developments of Freudian Theorising	45		
4 Learning Theory Perspectives on Personality	73		
5 Cognitive Personality Theories	103		
6 Humanistic Personality Theories	127		
7 The Trait Approach to Personality	163		
8 Biological Basis of Personality I: Genetic Heritability of Personality and Biological and Physiological Models of Personality	194		
9 Biological Basis of Personality II: Evolutionary Psychology and Animal Studies of Personality	225		
<b>PART 2</b> Intelligence	253		
10 An Introduction to Intelligence	254		
11 Theories and Measurement of Intelligence	274		
12 How Intelligence Tests are Used: What Questions Emerge from the Measurement of Intelligence?	301		
13 Heritability and Socially Defined Group Differences in Intelligence	334		
14 Intelligence and the Self: Emotional Intelligence, Creativity, and Sex Difference in Intelligence	372		
15 Personality and Intelligence in Education and Work	419		
		<b>PART 3</b> Applications in Individual Differences	447
		16 Optimism	448
		17 Irrational Beliefs	472
		18 Social Anxiety, Shyness and Embarrassment	495
		19 Interpersonal Relationships	522
		20 Social Attitudes and Culture	553
		21 Well-Being and Personality Disorders	592
		22 Individual Differences in Health and Illness	622
		23 An Introduction to Psychometric Testing	645
		<b>Glossary</b>	<b>G1</b>
		<b>References and further reading</b>	<b>R1</b>
		<b>Index</b>	<b>I1</b>
		<b>Publisher's acknowledgements</b>	<b>P1</b>
			<b>The following additional material can be found on the website</b> ( <a href="http://go.pearson.com/uk/he/resources">go.pearson.com/uk/he/resources</a> )
		24 Academic Argument and Thinking	687
		25 Statistical Terms	695
		26 Research Ethics	704



# CONTENTS



About the Authors	xix		
Preface	xx		
Acknowledgements	xxv		
<b>PART 1 Personality and Individual Differences</b>	<b>1</b>		
<b>1 Personality Theory in Context</b>	<b>2</b>		
Key themes	2		
Learning outcomes	2		
Introduction	3		
General population perspectives: implicit personality theories	3		
<i>Problems with implicit theories</i>	4		
How is personality defined?	4		
<i>Lay definitions of personality</i>	4		
<i>Psychological definitions of personality</i>	5		
The aims of studying personality	5		
<i>The source of the term 'personality'</i>	7		
<i>Approaches to studying personality: idiographic versus nomothetic</i>	8		
<i>Describing personality</i>	8		
<i>Distinctions and assertions in personality research</i>	9		
<i>Effects of personality versus situational effects</i>	10		
<i>Measurement issues</i>	11		
Strands of personality theorising	12		
<i>The clinical approach and its history</i>	12		
<i>Individual differences' emphasis on personality and its history</i>	13		
<i>Current conceptualisations of individual differences</i>	13		
<i>Studying personality as a personal experience</i>	15		
Reading critically and evaluating theories	16		
The cultural context of personality theories	19		
Final comments	19		
Summary	20		
Connecting up	20		
Critical thinking	20		
Going further	21		
Film and literature	22		
<b>2 The Basis of the Psychoanalytic Approach to Personality</b>	<b>23</b>		
Key themes	23		
Learning outcomes	23		
Introduction	24		
Description of Freud's theory of personality	24		
<i>Levels of consciousness</i>	24		
<i>The nature of human beings and the source of human motivation</i>	26		
		<i>The structure of the personality</i>	28
		<i>The development of personality</i>	29
		Defence mechanisms	32
		<i>Repression</i>	32
		<i>Denial</i>	33
		<i>Projection</i>	33
		<i>Reaction formation</i>	33
		<i>Rationalisation</i>	33
		<i>Conversion reaction</i>	34
		<i>Phobic avoidance</i>	34
		<i>Displacement</i>	34
		<i>Regression</i>	34
		<i>Isolation</i>	35
		<i>Undoing</i>	35
		<i>Sublimation</i>	35
		Clinical applications of Freudian theory	35
		Evaluation of Freudian theory	37
		<i>Description</i>	37
		<i>Explanation</i>	37
		<i>Empirical validity and testable concepts</i>	37
		<i>Comprehensiveness</i>	39
		<i>Parsimony</i>	40
		<i>Heuristic value</i>	40
		<i>Applied value</i>	40
		Final comments	40
		Summary	41
		Connecting up	42
		Critical thinking	42
		Going further	42
		Film and literature	44
<b>3 Developments of Freudian Theorising</b>	<b>45</b>		
Key themes	45		
Learning outcomes	45		
Introduction	46		
Individual psychology of Alfred Adler	47		
<i>Inferiority feelings</i>	47		
<i>Personality development in Adlerian terms</i>	48		
<i>Birth order</i>	48		
<i>Characteristics of the neurotic personality</i>	49		
<i>Adlerian treatment approaches</i>	50		
Evaluation of Adler's individual psychology theory	51		
<i>Description</i>	51		
<i>Explanation</i>	51		
<i>Testable concepts and their empirical validity</i>	51		
<i>Comprehensiveness</i>	52		
<i>Parsimony</i>	52		
<i>Heuristic value</i>	52		
<i>Applied value</i>	52		
Carl Jung and analytic psychology	53		
<i>Structures within the psyche</i>	54		
<i>Jungian personality types</i>	56		
<i>Jung's conception of mental illness and its treatment</i>	57		
Evaluation of Jung's theory	59		



Description	59	Going further	101
Explanation	59	Film and literature	102
Empirical validity	59		
Testable concepts	60	<b>5 Cognitive Personality Theories</b>	<b>103</b>
Comprehensiveness	60	Key themes	103
Parsimony	60	Learning outcomes	103
Heuristic value	60	Introduction	104
Applied value	60	Theory of personal constructs of George A. Kelly	105
The psychology of Karen Horney	60	<i>The view of the person in Kelly's theory</i>	105
Essentials of Horney's theoretical position	61	Concepts within Kelly's theory	106
The development of the personality and the neurotic personality	61	Personality development according to Kelly	110
Defence mechanisms	65	Assessing personality in personal construct theory	110
Penis envy and female masochism	66	Clinical applications of personal construct theory	112
Evaluation of Horney's theory	67	Albert Ellis and rational-emotive behaviour therapy	113
Description	67	Origins of the theory of rational-emotive behaviour therapy	113
Explanation	67	Rational and irrational thoughts	114
Empirical validity	67	The importance of perception and the subjective worldview	116
Testable concepts	68	Development of the individual	119
Comprehensiveness	68	The basic model of rational-emotive behaviour therapy	119
Parsimony	68	Sources of psychological disturbance	121
Heuristic value	68	Applications of rational-emotive behaviour therapy	121
Final comments	68	Research evidence for effectiveness of rational-emotive behaviour therapy	121
Summary	69	Contentious issues	122
Connecting up	70	Overall evaluation of cognitive approaches	123
Critical thinking	70	Description	123
Going further	71	Explanation	123
Film and literature	72	Empirical validity	123
		Testable concepts	123
<b>4 Learning Theory Perspectives on Personality</b>	<b>73</b>	Comprehensiveness	123
Key themes	73	Parsimony	123
Learning outcomes	73	Heuristic value	124
Introduction	74	Applied value	124
Introduction to learning theory	75	Final comments	124
<i>The clinical perspective within classical conditioning</i>	76	Summary	124
The radical behaviourism of B. F. Skinner	77	Connecting up	125
Attempts to apply learning theory approaches to personality	81	Critical thinking	125
<i>The stimulus-response model of personality of Dollard and Miller</i>	82	Going further	125
Albert Bandura and social learning theory	84	Film and literature	126
<i>Learning within Bandura's model</i>	85	<b>6 Humanistic Personality Theories</b>	<b>127</b>
<i>Personality development in social learning theory</i>	86	Key themes	127
<i>Self-efficacy as a self-regulatory process</i>	87	Learning outcomes	127
<i>Increasing self-efficacy ratings</i>	87	Introduction	128
<i>Measuring self-efficacy</i>	88	Historical roots and key elements of the humanistic approach	129
Julian Rotter and locus of control	89	Abraham Maslow and self-actualisation	129
<i>The impact of locus of control on behaviour</i>	90	<i>Human nature and human motivation</i>	129
Walter Mischel	91	<i>Hierarchy of needs</i>	131
<i>The impact of Mischel</i>	95	<i>Discussion of basic needs</i>	133
Evaluation of learning theory approaches	96	<i>Characteristics of self-actualisers</i>	133
Description	96	<i>Personality development</i>	134
Explanation	96	<i>Mental illness and its treatment in Maslow's approach</i>	135
Empirical validity	97	Evaluation of Maslow's theory	135
Testable concepts	97	Description	135
Comprehensiveness	97	Explanation	135
Parsimony	98	Empirical validity	136
Heuristic value	98	Testable concepts	136
Applied value	98	Comprehensiveness	136
Final comments	98	Parsimony	137
Summary	99	Heuristic value	137
Connecting up	100	Applied value	137
Critical thinking	100		

Carl Rogers and person-centred therapy	137	The big one? The general factor of personality	186
<i>Basic principles underlying the theory</i>	137	The Dark Triad	188
<i>Self-actualisation</i>	139	Evaluation of trait approaches	189
<i>Effect of society on self-actualisation</i>	139	Final comments	190
<i>Developmental impact on the child of their</i> <i>parents' self-concept</i>	141	Summary	190
<i>The role of the actualising tendency in development</i>	142	Connecting up	191
<i>Rogers' conceptualisation of psychological problems</i>	143	Critical thinking	191
<i>The principles of Rogerian counselling</i>	144	Going further	192
<i>The role of the therapist or counsellor</i>	146	Film and literature	193
Evaluation of Rogers' theory	149	<b>8 Biological Basis of Personality I: Genetic</b> <b>Heritability of Personality and Biological</b> <b>and Physiological Models of Personality</b>	<b>194</b>
<i>Description</i>	150	Key themes	194
<i>Explanation</i>	150	<i>Learning outcomes</i>	194
<i>Empirical validity</i>	150	Introduction	195
<i>Testable concepts</i>	150	Behavioural genetics	195
<i>Comprehensiveness</i>	150	<i>Behavioural genetics: basic ideas</i>	195
<i>Parsimony</i>	151	<i>How the influence of genes is assessed in behavioural</i> <i>genetics</i>	196
<i>Heuristic value</i>	151	<i>Methods for assessing genetic heritability of personality</i>	197
<i>Applied value</i>	151	<i>Genetic heritability estimates and personality</i>	198
Self-determination theory	151	Considerations within behavioural genetics and personality	202
<i>The four theories of self-determination theory</i>	152	<i>Conceptions of genetic heritability and the environment</i>	202
Evaluation of self-determination theory	156	<i>Different types of genetic variance</i>	203
<i>The reward controversy and the eight criteria</i>	156	<i>Shared and non-shared environments</i>	203
<i>Description</i>	157	<i>Problems with the representativeness of twin and</i> <i>adoption studies</i>	208
<i>Explanation</i>	157	<i>Assortative mating</i>	208
<i>Empirical validity and testable concepts</i>	157	<i>Changing world of genetics</i>	209
<i>Applied value</i>	157	A framework for considering heritability in personality	210
<i>Comprehensiveness</i>	158	Psychophysiology, neuropsychology and personality	212
<i>Parsimony</i>	158	<i>Eysenck's biological model of personality and arousal</i>	213
<i>Heuristic value</i>	158	<i>Gray's BAS/BIS theory</i>	214
Final comments	158	<i>Cloninger's biological model of personality</i>	217
Summary	159	Empirical evidence for biological theories of personality	219
Connecting up	160	<i>The central nervous system and biological personality</i> <i>dimensions</i>	219
Critical thinking	160	<i>The autonomic nervous system and biological personality</i> <i>dimensions</i>	220
Going further	160	<i>Biological personality dimensions and other biological</i> <i>and physiological systems</i>	220
Film and literature	161	<i>Consideration of biological theories of personality</i>	221
<b>7 The Trait Approach to Personality</b>	<b>163</b>	Final comments	221
Key themes	163	Summary	222
<i>Learning outcomes</i>	163	Connecting up	223
Introduction	164	Critical thinking	223
Emergence of personality traits	165	Going further	223
<i>Defining personality traits</i>	166	Film and literature	224
The development of trait theories within psychology	166	<b>9 Biological Basis of Personality II:</b> <b>Evolutionary Psychology and Animal</b> <b>Studies of Personality</b>	<b>225</b>
<i>Sheldon and somatotypes</i>	166	Key themes	225
Early lexical approaches to personality and the lexical hypothesis	167	<i>Learning outcomes</i>	225
Gordon Allport	168	Introduction	226
Raymond Cattell and the emergence of the factor analytic approach	170	Evolutionary theory	226
Types of traits	170	<i>Evolutionary psychology and adaptation</i>	226
Contribution of Cattell	174	Evolutionary personality and personality and individual differences psychology	231
Hans Eysenck's trait theory of personality	174	<i>An introduction to evolutionary personality psychology:</i> <i>Buss' theory of personality and adaptation</i>	231
<i>Eysenck's structure of personality</i>	175		
<i>Research evidence for Eysenck's types</i>	178		
<i>Psychopathology and Eysenck's therapeutic approach</i>	179		
<i>Eysenck's contribution to trait theorising</i>	179		
The five-factor model	179		
<i>Evidential sources for the five-factor model</i>	179		
A sixth personality factor? Expanding on the five-factor model of personality	182		
<i>The sixth factor of personality: honesty-humility? The</i> <i>introduction of the HEXACO model of personality</i>	182		
<i>Theory of the HEXACO model of personality structure</i>	182		

*How individual differences arise through cooperation: the example of leadership* 233  
*Life history and personality* 235  
*Consideration of the evolutionary theory of personality* 238  
**Animals and their personality** 239  
*Animals and personality: a historical context* 239  
*Within-species versus cross-species comparisons* 239  
*Methods in animal personality research* 240  
*Reliability and validity of animal personality research* 240  
*'Said the spider to the fly': spiders and personality* 241  
*Animal personality: the emergence of the five-factor model of personality* 242  
*Animal personality: informing evolutionary theories of personality?* 243  
*Consideration of animal personality research* 244  
**Adaptive personality and behavioural ecology** 246  
*Definitions of personality: broad and narrow* 246  
*Behavioural consistency: short-term and long-term variation* 247  
*The conceptual nature and function of adaptive personality traits: plasticity versus highly constrained* 247  
*Models of adaptive personality* 248  
**Final comments** 248  
**Summary** 249  
**Connecting up** 249  
**Critical thinking** 250  
**Going further** 250  
**Film and literature** 251

**The birth of the psychology of intelligence: Galton and Binet** 275  
*Galton* 275  
*Binet* 276  
**The search for measurement continues: the birth of 'IQ' and standardised testing** 277  
*Terman* 277  
*Yerkes* 278  
**General intelligence (g): the theory and the measurement 'g'** 279  
*Measuring 'g': the Wechsler and Raven's Matrices* 280  
**Multifactor theorists: Thurstone, Cattell and Guilford** 287  
*Thurstone: 'g' results from seven primary mental abilities* 287  
*Cattell: fluid and crystallised intelligence* 288  
*Guilford: many different intelligences and many different combinations* 288  
**Intelligence and factor analysis – a third way: the hierarchical approach** 289  
*Vernon* 290  
*Carroll: from the Three-Stratum Model of Human Cognitive Abilities to CHC* 291  
*Cattell, Horn and Carroll (CHC): theory, research and practice together* 291  
**Other theories of intelligence: Gardner and Sternberg** 292  
*Howard Gardner: multiple intelligences* 292  
*Robert Sternberg* 295  
**Final comments** 297  
**Summary** 298  
**Connecting up** 299  
**Critical thinking** 299  
**Going further** 300  
**Film and literature** 300

**PART 2 Intelligence 253**

**10 An Introduction to Intelligence 254**

*Key themes* 254  
*Learning outcomes* 254  
*Introduction* 255  
**Why does intelligence matter?** 255  
**Implicit theories of intelligence** 256  
*Research into implicit theories of intelligence* 256  
*Laypersons' implicit theories of intelligence* 256  
*Laypersons' implicit theories across cultures* 258  
*Implicit theories of intelligence across the lifespan* 262  
**Implicit theories about intelligence: Entity versus Incremental theories of intelligence** 266  
*Entity versus Incremental theories of intelligence* 266  
*'Mindsets': Entity versus Incremental/Growth* 267  
**A task force in intelligence** 268  
**The focus of this part of the text** 269  
**Final comments** 270  
**Summary** 270  
**Connecting up** 271  
**Critical thinking** 271  
**Going further** 271  
**Film and literature** 273

**11 Theories and Measurement of Intelligence 274**

*Key themes* 274  
*Learning outcomes* 274  
**Introduction** 275

**12 How Intelligence Tests are Used: What Questions Emerge from the Measurement of Intelligence? 301**

*Key themes* 301  
*Learning outcomes* 301  
**Introduction** 302  
**Types of intelligence tests** 302  
*The distinction between the psychometric and the cognitive psychology approaches to intelligence testing* 303  
*Simple biological and physiological measures of intelligence* 303  
*Alexander Romanovich Luria* 304  
*Das and Naglieri's cognitive assessment system and the Kaufmans' ability tests* 306  
**Features, uses and problems surrounding intelligence tests** 310  
*Typical features of intelligence tests* 310  
*The usefulness of intelligence tests: education* 310  
*The usefulness of intelligence tests: health* 312  
*Problems and issues with intelligence tests* 314  
*The intelligent use of intelligence tests* 318  
*Some concluding comments* 319  
**The Flynn effect** 319  
*How was the Flynn effect discovered?* 319  
*Explanations of the Flynn effect* 321  
*The nutrition hypothesis versus the cognitive stimulation hypothesis* 326  
*An end to the Flynn effect?* 329  
*The Flynn effect across a century – life history speed and economic prosperity* 329



Final comments	331	<i>Goleman's model of emotional intelligence</i>	377
Summary	331	<i>Bar-On's model of emotional intelligence</i>	380
Connecting up	332	<i>Trait emotional intelligence</i>	381
Critical thinking	332	<i>Comparing ability and mixed models of emotional intelligence</i>	383
Going further	332	<i>Emotional intelligence in the context of a personality system framework</i>	384
Film and literature	333	<i>Considering different models of emotional intelligence alongside each other</i>	385
		<i>The application of emotional intelligence in psychology</i>	386
<b>13 Heritability and Socially Defined Group Differences in Intelligence</b>	<b>334</b>	<i>Critical consideration of emotional intelligence theory and research</i>	387
Key themes	334	Creativity	389
Learning outcomes	334	Person	390
Introduction	335	Process	390
<b>Section A - The heritability of intelligence</b>	336	Press	391
<i>Intelligence: the nature versus nurture debate</i>	336	Product	391
Galton	336	<i>Sternberg's creative leadership theory: what constitutes creativity?</i>	392
Heritability of intelligence	337	Creativity and the brain	394
What do we mean by heritability of intelligence?	338	Creativity and 'psychopathology'	395
Methods for assessing genetic heritability of intelligence	338	Sex differences in intelligence	398
Heritability estimates of intelligence	339	<i>Sex differences on measures of general intelligence</i>	398
Considerations within behavioural genetics and intelligence	341	<i>Sex differences in specific intelligences</i>	399
Estimates of the genetic heritability of intelligence	343	Looking for explanations of sex differences in measures of intelligence	402
Environmental influences on intelligence	343	Biological explanations for sex differences in intelligence	402
Biological variables and maternal effects	344	<i>Biological variables for sex differences in measures of general intelligence</i>	402
Family environment	347	<i>Summary of biological factors in sex differences in intelligence</i>	407
Education and intelligence	353	Environmental explanations for sex differences in intelligence	407
Culture and intelligence	354	<i>Stereotypes and sex differences in intelligence outside of education</i>	408
Final comments on genetic heritability and environmental influences on intelligence	355	<i>Stereotypes and sex differences in intelligence within education</i>	409
<b>Section B - The bell curve: group differences in intelligence based on race</b>	356	<i>Interactions between technology and socioeconomic status and their influence on intelligence in the classroom</i>	410
The bell curve	356	A final consideration of sex differences in measures of intelligence	413
<i>The bell curve: intelligence and class structure in American life</i>	356	<i>Stereotype emphasis</i>	413
<i>The cognitive elite: looking at the higher end of the bell curve</i>	358	<i>Placing the extent of sex differences in intelligence within its proper context</i>	413
<i>IQ scores and social and economic problems: looking at the lower end of the bell curve</i>	358	<i>Interim summary for sex differences in intelligence</i>	414
<i>The relationship between race and IQ: implications for social policy</i>	359	Final comments	415
<i>Criticisms of The Bell Curve: Intelligence and Class Structure in American Life</i>	360	Summary	415
<i>Analysis of the assumptions used by Herrnstein and Murray</i>	361	Connecting up	416
<i>Statistical and evidence-based problems in The Bell Curve arguments</i>	365	Critical thinking	416
<i>A darker side of psychology related to Herrnstein and Murray's analysis</i>	366	Going further	417
Final comments	368	Film and literature	418
Summary	369		
Connecting up	369	<b>15 Personality and Intelligence in Education and Work</b>	<b>419</b>
Critical thinking	369	Key themes	419
Going further	370	Learning outcomes	419
Film and literature	371	Introduction	420
		Personality and intelligence predictors of achievement in education and the workplace	421
<b>14 Intelligence and the Self: Emotional Intelligence, Creativity and Sex Difference in Intelligence</b>	<b>372</b>	<i>Established measures of personality and intelligence: predictors of achievement in education and work</i>	421
Key themes	372	<i>The difficulties with using established measures of personality and intelligence in education and work</i>	424
Learning outcomes	372		
Introduction	373		
Emotional intelligence	374		
<i>Salovey and Mayer's four-branch model of emotional intelligence</i>	374		

Learning styles and experiential learning theory	426
<i>Learning processes</i>	426
<i>Learning styles</i>	427
<i>Application and measurement of learning processes and styles</i>	428
<i>Critical consideration of Kolb's theory</i>	429
Emotional intelligence in education and the workplace	429
<i>Goleman's theory of emotional intelligence</i>	429
<i>Emotional intelligence and leadership</i>	429
<i>Emotional intelligence and self-learning</i>	430
<i>Emotional intelligence and achievement in the workplace</i>	431
<i>Consideration of emotional intelligence in education and the workplace</i>	431
Successful intelligence and leadership: wisdom and giftedness	433
<i>Wisdom</i>	433
Giftedness	435
<i>Giftedness, termites and IQ scores</i>	435
<i>Modern conceptions of giftedness: not just high IQ?</i>	436
<i>Psychological models of giftedness</i>	438
<i>Summary of giftedness</i>	440
Working with those who have learning disabilities	440
<i>Working with those who have learning disabilities: the darker historical line</i>	441
<i>Working with those who have learning disabilities: the positive historical line</i>	441
<i>Feuerstein and Structural Cognitive Modifiability</i>	442
<i>Theory and programme of structural Cognitive Modifiability</i>	442
Final comments	444
Summary	444
Connecting up	445
Critical thinking	445
Going further	445
Film and literature	446

**PART 3 Applications in Individual Differences 447**

<b>16 Optimism</b>	<b>448</b>
<i>Key themes</i>	448
<i>Learning outcomes</i>	448
<i>Introduction</i>	449
Learned optimism – explanatory style	451
<i>Learned helplessness versus learned optimism</i>	451
<i>The ABC format</i>	453
<i>Distraction and disputation</i>	453
Dispositional optimism	454
<i>The Life Orientation Test: a measure of dispositional optimism</i>	454
Optimism and well-being	455
<i>Coping and appraisals</i>	455
<i>Benefits of optimism and well-being</i>	457
<i>Optimism: a cloud in the silver lining?</i>	460
Situational optimism	460
Hope	462
<i>Benefits of hope</i>	463
<i>Measurement of hope</i>	465
<i>A consideration of false hope</i>	465
Optimism versus 'positive thinking'	466

Final comments	468
Summary	468
Connecting up	468
Critical thinking	469
Going further	470
Film and literature	470

**17 Irrational Beliefs 472**

<i>Key themes</i>	472
<i>Learning outcomes</i>	472
<i>Introduction</i>	473
The basic theory of rational-emotive behaviour therapy (REBT)	474
<i>The ABCs of human disturbance</i>	474
<i>'Must-urbatory' thinking and disturbance</i>	477
<i>Irrational beliefs and mental health</i>	480
Issues with irrational beliefs that need to be considered and addressed	482
<i>The case for and against religion</i>	483
<i>The case for and against luck: the importance of belief in good luck</i>	486
<i>Superstitious beliefs</i>	488
Irrational beliefs and sport	489
Final comments	491
Summary	491
Connecting up	492
Critical thinking	492
Going further	493
Film and literature	494

**18 Social Anxiety, Shyness and Embarrassment 495**

<i>Key themes</i>	495
<i>Learning outcomes</i>	495
<i>Introduction</i>	496
Introducing social anxieties and social anxiety disorder	497
What exactly is social anxiety disorder?	497
<i>General symptoms, prevalence and conceptions of social anxiety disorder</i>	498
<i>Definitions and diagnosis of social anxiety disorder</i>	499
<i>What causes social anxiety disorder?</i>	501
Shyness	504
<i>What is shyness?</i>	505
<i>The consequences of shyness</i>	506
State versus trait shyness	507
<i>State shyness</i>	508
<i>Trait shyness</i>	508
Embarrassment	512
<i>Four theories of embarrassment</i>	513
<i>Re-evaluation of the embarrassment models</i>	515
<i>Categorisation of embarrassing situations</i>	515
<i>Embarrassment, measurement and personality</i>	516
Final comments	518
Summary	518
Connecting up	519
Critical thinking	519
Going further	520
Film and literature	521

**19 Interpersonal relationships 522**

<i>Key themes</i>	522
<i>Learning outcomes</i>	522
<i>Introduction</i>	523

Interpersonal attraction	523	Summary	588
<i>Theories of interpersonal attraction</i>	523	<i>Connecting up</i>	589
<i>Fatal attraction</i>	525	<i>Critical thinking</i>	589
Love styles	526	<i>Going further</i>	590
<i>The triangular theory of love</i>	526	<i>Film and literature</i>	590
<i>Love styles (or the colours of love)</i>	528		
<i>Individual and group differences in love styles</i>	530	<b>21 Well-Being and Personality Disorders</b>	<b>592</b>
Romantic love and attachment styles	530	<i>Key themes</i>	592
Online dating and personality styles	532	<i>Learning outcomes</i>	592
Relationship dissolution	534	<i>Introduction</i>	593
<i>The investment model</i>	534	The structure and measurement of well-being	593
<i>How individuals initiate the end of a relationship</i>	536	<i>Circumplex Theory of Affect: the structure of mood</i>	594
<i>How individuals react when the other person initiates</i>		<i>Subjective and psychological well-being</i>	595
<i>the end of the relationship</i>	538	Psychological well-being as a resilience across	
Introducing forgiveness	539	the life-span	600
<i>What is forgiveness?</i>	540	Personality, mood and well-being	600
<i>Models of the forgiveness process</i>	541	Personality disorders	603
<i>The Enright model of forgiveness</i>	541	<i>General criteria for personality disorders:</i>	
<i>The Worthington (pyramidal) model</i>	544	<i>the Diagnostic and Statistical Manual of Mental</i>	
<i>Forgiveness and attachment</i>	546	<i>Disorders (DSM-5) (American Psychiatric</i>	
<i>Forgiveness and personality</i>	546	<i>Association, 2013)</i>	604
Final comments	549	<i>Personality disorders: Cluster A: paranoid, schizoid</i>	
Summary	549	<i>and schizotypal personality disorders</i>	606
Connecting up	550	<i>Personality disorders: Cluster B: antisocial, borderline,</i>	
Critical thinking	550	<i>histrionic and narcissistic personality disorders</i>	608
Going further	551	<i>Personality disorders: Cluster C: avoidant, dependent</i>	
Film and literature	552	<i>and obsessive-compulsive personality disorders</i>	610
		<i>Genetic, biological and environmental influences on</i>	
		<i>personality disorders</i>	612
		<i>Five-factor correlates of personality disorders</i>	617
		<i>Issues with the conceptualisation and categorisation</i>	
		<i>of personality disorders</i>	617
		Final comments	618
		Summary	618
		Connecting up	620
		Critical thinking	620
		Going further	620
		Film and literature	621
<b>20 Social Attitudes and Culture</b>	<b>553</b>	<b>22 Individual Differences in Health and Illness</b>	<b>622</b>
<i>Key themes</i>	553	<i>Key themes</i>	622
<i>Learning outcomes</i>	553	<i>Learning outcomes</i>	622
<i>Introduction</i>	554	<i>Introduction</i>	623
Right-wing authoritarianism, conservatism and		Defining health	624
social dominance	554	Personality, health and illness: how might they be linked?	626
Authoritarianism	555	Personality traits and health in the five-factor model	
Conservatism	557	<i>(Big Five)</i>	627
Social dominance orientation	559	Researching the links between personality, health	
Theory of social dominance	560	and illness	628
<i>The measurement of social dominance orientation</i>	561	<i>Type A and Type B personality</i>	628
Right-wing attitudes and personality	562	<i>Measurement of Type A/B personality</i>	629
<i>Right-wing attitudes and Eysenck's theory of personality</i>	562	<i>Research on Type A/B personality</i>	629
<i>Five-factor theory of personality and conservatism</i>	564	<i>Further psychological research on Type A personality</i>	631
Critical consideration of right-wing attitudes theory	565	<i>Type D personality</i>	632
Religion	566	Individual differences in the reaction to physical illness	632
<i>Dimensions of religiosity</i>	566	<i>Conceptualising stress</i>	633
<i>Religion and personality</i>	569	<i>Depression</i>	635
<i>Critical review</i>	570	<i>Anxiety defined</i>	636
Social media use	571	Concepts especially relevant to health psychology	
<i>Definitions of social media use</i>	571	covered previously	636
<i>Social media use and personality</i>	572	<i>Locus of control</i>	636
Culture theory and personality	574	<i>Self-efficacy</i>	638
<i>Psychological anthropology</i>	574	<i>Optimism</i>	638
<i>Configurationalist approach</i>	575		
<i>Basic and modal personality structure approach</i>	576		
<i>National character</i>	576		
<i>Personality and national culture: the work of Hofstede</i>	579		
Integrative model of personality	582		
<i>Evolution and human behaviour</i>	582		
<i>The dispositional signature</i>	583		
<i>Characteristic adaptations</i>	584		
<i>Life narratives and the challenge of modern identity</i>	584		
<i>The differential role of culture</i>	585		
<i>Critiques of the integrative model of personality</i>	587		
Final comments	588		



Intelligence	639	<b>24 Academic Argument and Thinking</b>	<b>687</b>
Expanding definitions of health and well-being	639	Key themes	687
Personality and well-being: the positive psychology approach	639	Learning outcomes	687
Final comments	641	Introduction	688
Summary	641	The structure of arguments: premises and conclusions	688
Connecting up	642	Deductive versus inductive arguments	689
Critical thinking	642	Fallacies in arguments	690
Going further	643	Fallacies of the undistributed middle	690
Film and literature	644	The fallacy of affirming the consequent	690
<b>23 An Introduction to Psychometric Testing</b>	<b>645</b>	Argument directed at the person (argumentum ad hominem, 'argument directed at the man')	691
Key themes	645	Appealing to ignorance or absence of fact (argumentum ad ignorantiam, 'argument to ignorance')	691
Learning outcomes	645	Appeal to popular beliefs (argumentum ad populum, 'argument to the people')	692
Introduction	646	Appeal to emotion (argumentum ad misericordiam, 'argument to pity')	692
Types and uses of psychometric tests	646	False dilemma	692
Developing a psychometric test	647	Comparing populations	693
Developing items for a psychometric test	647	Summary	694
Writing items for a psychometric test	648	Going further	694
Clarity of questions	649	<b>25 Statistical Terms</b>	<b>695</b>
Leading questions	650	Key themes	695
Embarrassing questions	650	Learning outcomes	695
Hypothetical questions	650	Introduction	696
Questions with reverse wording	651	Tests of association	696
Response formats	652	Correlation coefficients	696
Instructions	653	Factor analysis	697
Collecting the data	654	Multiple regression	700
Reliability	654	Tests of difference	701
Internal reliability (internal consistency)	654	Tests of difference for two sets of scores	701
Using internal reliability to select items	656	Tests of difference for more than two sets of scores	701
Computing the scale (producing an overall score)	661	Meta-analysis	701
Test-retest reliability (reliability over time)	661	Effect size	702
Validity	663	Summary	703
Advanced techniques in psychometric evaluation:		Going further	703
factor analysis	670	<b>26 Research Ethics</b>	<b>704</b>
Factor analysis	670	Key themes	704
Exploratory factor analysis	672	Learning outcomes	704
Confirmatory factor analysis	678	Introduction	705
The International Personality Item Pool and the Higher Education Academy in Psychology practicals web page	680	What do we mean by research ethics?	705
Final comments	680	Why do we need ethical codes?	705
Summary	683	Basic principles for ethical research	705
Connecting up	684	Research studies have to comply with all legal requirements	705
Critical thinking	684	Research participants	706
Going further	685	NHS, social services/social care and HMPPS research	708
Film and literature	685	Ethical principles for conducting research with human participants (The British Psychological Society)	708
<b>Glossary</b>	<b>G1</b>	Going further	708
<b>References and further reading</b>	<b>R1</b>		
<b>Index</b>	<b>I1</b>		
<b>Publisher's acknowledgements</b>	<b>P1</b>		



The following additional material can be found on the website ([go.pearson.com/uk/he/resources](http://go.pearson.com/uk/he/resources))

## Companion website

For open-access **student resources** specifically written to complement this textbook and support your learning, including three additional web-only chapters, please visit [go.pearson.com/uk/he/resources](http://go.pearson.com/uk/he/resources)



## Lecturer resources

For password-protected online resources tailored to support the use of this textbook in teaching, please visit [go.pearson.com/uk/he/resources](http://go.pearson.com/uk/he/resources)

# Pearson's Commitment to Diversity, Equity and Inclusion

Pearson is dedicated to creating bias-free content that reflects the diversity, depth and breadth of all learners' lived experiences. We embrace the many dimensions of diversity including, but not limited to, race, ethnicity, gender, sex, sexual orientation, socioeconomic status, ability, age and religious or political beliefs.

Education is a powerful force for equity and change in our world. It has the potential to deliver opportunities that improve lives and enable economic mobility. As we work with authors to create content for every product and service, we acknowledge our responsibility to demonstrate inclusivity and incorporate diverse scholarship so that everyone can achieve their potential through learning. As the world's leading learning company, we have a duty to help drive change and live up to our purpose to help more people create a better life for themselves and to create a better world.

Our ambition is to purposefully contribute to a world where:

- Everyone has an equitable and lifelong opportunity to succeed through learning.
- Our educational products and services are inclusive and represent the rich diversity of learners.
- Our educational content accurately reflects the histories and lived experiences of the learners we serve.
- Our educational content prompts deeper discussions with students and motivates them to expand their own learning and worldview.

We are also committed to providing products that are fully accessible to all learners. As per Pearson's guidelines for accessible educational Web media, we test and retest the capabilities of our products against the highest standards for every release, following the WCAG guidelines in developing new products for copyright year 2022 and beyond. You can learn more about Pearson's commitment to accessibility at:

<https://www.pearson.com/us/accessibility.html>

While we work hard to present unbiased, fully accessible content, we want to hear from you about any concerns or needs regarding this Pearson product so that we can investigate and address them.

- Please contact us with concerns about any potential bias at:  
<https://www.pearson.com/report-bias.html>
- For accessibility-related issues, such as using assistive technology with Pearson products, alternative text requests, or accessibility documentation, email the Pearson Disability Support team at:  
[disability.support@pearson.com](mailto:disability.support@pearson.com)

# ABOUT THE AUTHORS



**Professor John Maltby** is at the University of Leicester. He has over 200 publications in the area of personality and individual differences, psychometrics, and well-being.

**Dr Liz Day** is a Senior Lecturer in Psychology at Sheffield Hallam University. She has over 60 publications in the area of individual differences. She also trained as a Clinical Hypnotherapist.

**Professor Ann Macaskill** is at Sheffield Hallam University and is a Chartered Health Psychologist and trained in cognitive behaviour therapy. She has over 100 publications, with current research in individual differences, health and well-being.

# PREFACE



## Introduction

How would you describe your personality? Are you outgoing? Do you make friends easily? Do you worry too much? Think of two or three words that best describe how you generally behave, think and feel. How would you describe your general level of intelligence? Are you particularly good at some things and not so good at others?

Now think of your brothers or sisters (if you have them). Compared to everyone else you know, how similar are your brothers and sisters to your personality and level of intelligence? How like your parents are you? Are you more like your mother or your father? Would you say you and your friends have similar personalities, or very different ones?

Do you respond to situations in the same way that your family and friends respond? Do you hold similar views about the world, or very different ones? When it comes to general approaches to life, how different are you to everyone around you? Do you generally have a happy disposition or find life difficult a lot of the time? Can you name people who are similar in your approach to life, and people who are very different? In psychology, personality, individual differences and intelligence are all topics that examine how people are similar and how they differ in their behaviour, the way they think and how they feel. In this text we provide an overview of major theories, methods, research findings and debates in personality, individual differences and intelligence. Although the areas of personality, individual differences and intelligence cover a multitude of subjects, ranging from psychophysiology to socially learnt behaviour, you will see how these three main topics come together by using several similar approaches.

Our aim is to cover the topic areas that meet the requirements of the British Psychological Society qualifying exam and the Quality Assurance Agency Benchmarks for Psychology under their heading of 'Individual Differences'. The contents of this examination help to define the curriculum that is taught in psychology undergraduate degrees accredited by the British Psychological Society. With the British Psychological Society and Quality Assurance Agency Benchmarks for Psychology curriculum requirements in mind, this text also covers aspects of the history of various theories and approaches. This information will be useful for courses that teach history of

psychology in an integrated fashion within specific modules.

Consequently, the overall aim of the text is to include substantial coverage of personality, individual differences and intelligence, as well as their integration that is applicable to United Kingdom/European students. We have discussed historical material and viewpoints as well as including contemporary and newer debates to make the material accessible and interesting to read.

We have written text with the novice in mind, and we guide you through the material, from the foundations to the more advanced material, so you can constantly build on previously acquired knowledge and build up a critical understanding of each topic.

To help you do this, we include opportunities to reflect on the material and test your own understanding.

## Structure of the text

While writing this text, we consulted over 30 academics in the United Kingdom and Europe over what it should cover. We now know that people have many different ideas about what constitutes personality, intelligence and individual differences. We know that some courses teach all three topics as an Individual Differences course. Other courses see large distinctions between the different areas covered; for example, personality and intelligence. With this in mind, we have not assumed that there is a typical route through the text. Instead, we have sought to make the material in each chapter self-contained so that it may be taught separately. That said, you can divide the text's contents in the following three ways: parts, levels and themes.

## Parts of the text

The first way that this text is organised is into three parts: (1) personality, (2) intelligence and (3) further debates and applications in individual differences. It is easy to see how these three sections might be taught separately as topic areas. Each part also has its own introduction, which serves as a guide and helps you structure your learning.



## Part 1: Personality

The aim of this part is to provide a parsimonious account of personality theories and approaches to individual differences. We cover the major schools of psychology (psychoanalytic, learning, cognitive, humanistic, trait theorists and biological). Theories are set in a historical context and issues and debates are highlighted, always bearing in mind the key questions that the theories are designed to address. Topics covered include the nature of human beings, the basis of human motivation, the generation of emotions and cognitions and conceptions of psychological health and illness within the various models. Where appropriate, clinical applications of the various theories are also examined, not only to complement your learning in abnormal psychology but also to appeal to those of you with an interest in clinical psychology. Consistent criteria are used throughout to help you to evaluate, compare and contrast the various theoretical approaches. By the end of Part 1, readers will have a theoretical and a research-based appreciation of the sources of individual differences in behaviour, thinking and feeling.

## Part 2: Intelligence

This part of the text covers theory, research, measurement and the application of intelligence. This is a controversial area of psychology, where there is a lot of debate. Indeed, you may already have some feelings about theories and measurement of intelligence. For example, what is your view of intelligence tests? If you haven't a view now, you will have by the end of Part 2. We have given full consideration to the theories and controversies in the topic of intelligence, and we highlight classical and modern approaches to how intelligence is defined, debated and applied, all within the historical context of intelligence.

## Part 3: Further debates and applications in individual differences

The aim of this part is to cover a series of subjects that are commonly covered in the personality and individual differences journals, but much less so in personality and individual differences textbooks. The rationale for the topics chosen is to draw on influential subjects in individual differences that are contemporary and that we know excite students.

Individual differences in optimism, irrational beliefs, social anxiety, personal relationships, health, well-being and the social attitudes are important when applied in the individual differences literature to explain a wealth of human behaviours, feelings, thinking and reactions. These include explanations of our mental health, how we succeed and fail in interpersonal relationships and how we understand the social world. We have also structured these chap-

ters to develop your 'individual differences' thinking by drawing on different aspects of theory and methodology. For example, in the optimism chapter we will show you how it is useful to unfold a single concept to allow a number of different considerations. In the irrational beliefs chapter we will present the central idea of irrational beliefs and show you how to assess the strength of this concept through to a conclusion by exploring how well it applies to a number of situations. In the social anxiety chapter, we consider two subject areas (shyness and embarrassment) and show you how sometimes it is useful to provide a general context to ideas. In the interpersonal relationships chapter, we show you how useful it can be to take a series of topics and try to link them together, so that you can present an overall process and identify recurring themes.

## Level of study

The second way that this text is organised is through level of study. We are aware that some psychology courses teach different topic areas in personality, intelligence and individual differences in different years (ranging from first year to final year). Therefore, we have organised each of the three parts of the text so that the later chapters in each part may be considered as more advanced topics of study. In this way, there is a developmental progression in the learning. This also means that the text should be useful across all the years of your degree.

- **Personality** – This topic area is presented mainly in historical order. Therefore, you will see how approaches and theories in individuals have developed over time. In this part you can compare the classical psychoanalytic, learning, cognitive and humanistic approaches (Chapters 2–6) to understanding the self with modern-day humanistic, trait and biological approaches (Chapters 7–9) in individual differences.
- **Intelligence** – In this topic area the development of learning focuses on a historical overview but is also a comparison in terms of the complexity of arguments. We contrast everyday notions of intelligence and a historical overview of classical and modern theories and applications of intelligence (Chapters 10–12) with controversial and modern-day considerations and applications of intelligence (Chapters 13–15).
- **Further debates and applications in individual differences** – In this topic area the development is based on the number of subjects covered in the chapter. Therefore, the chapters that look at single concepts, such as optimism and irrational beliefs (Chapters 16 and 17), compare with the chapters that look at several topic areas surrounding social anxiety, interpersonal relationships and social attitudes and health well-being (Chapters 18–22).

## Themes within the text

The main themes within the text reflect the British Psychological Society qualifying exam. In line with the exam, we have outlined the assumptions, evidence and main approaches to emotion, motivation, the self and personality and abnormal development. We consider the psycho-analytic, behavioural, cultural, social learning, social-cognitive, radical behaviourist, humanistic-existential, phenomenological, lexical-trait, neo-Darwinist, biological and behavioural genetic approaches to personality. These approaches can be found definitively in Chapters 1–9, but topics covering biological, cognitive and social learning aspects to emotion, motivation, the self, personality and abnormal development are also covered in Chapters 16, 17 and 18.

The influence of genetic, biological, environmental and cultural factors on individual differences, as well as the temporal and situational consistency of individual differences, is addressed throughout the text from Chapter 1 to Chapter 23. The controversies and debates regarding the interaction of genetic, environmental and cultural factors on personality and intelligence are focused on in Chapters 8 and 13.

The influence of personality, intelligence and individual differences on other behaviours, including health, education, culture, relationships, occupational choice and competency, again, is a focus throughout the text from Chapters 1 to 23. For specific examples, you may want to concentrate on Chapters 5 and 6 as well as Chapters 12 through to 23.

The history of mental and psychological testing, the nature of intelligence, contemporary approaches to intelligence and their implications for educational and social policy are covered in Chapters 10–15.

We would also like to draw your attention to other themes that might reflect emerging interests of students in individual differences and provide the basis of material for option modules. For example, those interested in following a theme on well-being might focus on the latter part of the book (Chapters 16–22) in addition to the chapters covering Freud (Chapter 2), Jung, Adler and Horney (Chapter 3), Ellis (Chapter 5), humanistic psychology (Chapter 6) and self-determination theory (Chapter 6). Those interested in statistical applications in psychology would be able to show the uses of factor analysis in intelligence testing (Chapter 11), meta-analysis and effect sizes in comparing sex differences in intelligence (Chapter 14) and the use of psychometrics in developing psychological tests (Chapter 23). Those interested in developing a positive psychology theme should note that there is material on theories within humanistic psychology (Chapter 6), self-determination theory (Chapter 6), wisdom and creativity (Chapter 15), optimism and hope (Chapter 16), love

(Chapter 19), forgiveness (Chapter 19), positive aspects of religiosity (Chapter 20), subjective and psychological well-being (Chapter 21) and positive psychology and health (Chapter 22).

Finally, for this third edition of the text, there are some changes and additions since the last edition. As the literature is constantly updating, we have revised all chapters to include recent and key papers. We have also provided substantial new sections in the biologically focused chapters (Chapters 8 and 9), outlining the adaptive personality and behavioural ecology and debates around the general factor of personality, and introduced some further discussion (e.g. the Dickens/Flynn Model) around the Flynn effect (covered in Chapter 12).

Additionally, in each chapter we have referred the reader to related discussions in other areas of the text.

## Features of the text

There are features to the text, including within-chapter features and supplementary material provided on a website.

### Within-chapter features

Each chapter has these features:

- **Key themes**, so you know the general areas that are covered in each chapter.
- Clear chapter objectives, put in the form of **learning outcomes**, so you can check that you have covered all the major areas.
- A series called **Stop and think** that asks you to think about the areas a little more, or gives you some further information to think about. These features are provided to spur you on and to start thinking critically about the area you have just read.
- **Profiles** that outline biographies of key thinkers or researchers in the topic area, so you get to know more about these psychologists.
- A number of chapters feature **Career focus** interviews, which explore the roles of different psychologists, such as clinical psychologist, neuropsychologist and organisational psychologist, and ask how skills and knowledge learned when studying personality and individual differences apply in these areas.
- **Summary** boxes at the end of each chapter to outline the main points that you should take forward.
- **Discussion questions** containing material that might be suitable for discussion or seminar work.
- **Essay questions** that address the core material in the chapter, allowing you to test your own knowledge and practise essays in the area.

- **Going further** material via key texts, journals and established web resources. This is to get you reading more around the topic areas.
- References to **film and literature** that reflect some of the ideas explored in the chapter.
- **Connecting up** points that references material elsewhere in the text that links with the themes explored in the chapter.

## Personality, Individual Differences and Intelligence Companion Website ([go.pearson.com/uk/he/resources](http://go.pearson.com/uk/he/resources))

In addition to the features integrated into the text, there is also a variety of valuable resources on the website for both students and lecturers.

The Companion Website for students includes:

- **Multiple choice questions** – You will be able to access over 200 multiple choice questions so you can test your knowledge of the topics covered in the book.
- **Essay questions** – In addition to those in the text there are over 100 essay questions covering a range of topics so you can practise for your essay and examination assessment.
- **Advanced reading** – There are over 20 additional topic areas and recent readings that can be used to supplement or advance your study and act as a source for ideas for your independent projects.

For lecturers there are:

- **PowerPoint slides** – These slides contain details of the main areas and figures provided in each chapter.

Also online are three supplementary chapters. These provide a framework for many of the academic and technical terms that are commonly used in the text and should be used as reference material to support your learning. One might expect to find a chapter early in the text outlining these terms; however, we found that it distracted from the content. We also didn't wish to dictate certain areas of study if the lecturer did not feel they were needed or taught these aspects in different ways.

The three chapters are on the following topics:

- **Academic argument (Chapter 24)** – In this chapter we discuss acceptable and unacceptable forms of academic argument. At points within the text, you will come across academic arguments that form the basis of discussion and debate in chapters. So this chapter on academic argument can be helpful to you to appreciate

many aspects of the debate fully. There are many controversies and arguments in personality, individual differences and intelligence, and it is important that you are able to use argument effectively. This chapter can be used to inform what constitutes effective and valid argument and what comprises poor argument. It will also give you advice on the key ideas in critical thinking that can be used to improve your academic work.

- **Statistical analysis (Chapter 25)** – This chapter describes the statistical ideas that lie behind simple inferential statistics (i.e. correlations and *t*-tests); multivariate statistics, such as factor analysis and multiple regression; and advanced considerations in statistics, including meta-analysis and effect size. This material is needed because throughout the text we use statistical terms and concepts to outline, illustrate and support the topics we discuss. The use of statistical terms is common in psychology, and through your research methods and statistics classes you will already be aware of, or become familiar with, many of the terms we mention. However, there may be some statistical concepts with which you are less familiar. Whatever your knowledge or experience of statistical terms, we have included some supplementary material that will give you an easy understanding of many of the statistical terms to build your confidence with using these concepts in the material.
- **Ethics (Chapter 26)** – This chapter deals with ethics. Several times in the text, we touch on issues of ethics; for example, when considering psychoanalytic and humanistic personality or psychology or psychological testing in education and the workplace. This chapter, which outlines ethical guidelines alongside those suggested for research participants by the British Psychological Society, might prove useful in supplementing these discussions.

All these chapters refer to core academic skills or approaches in psychology. You might want to read through these chapters or you might like to use them as a resource that you can draw upon when required.

## Final prefatorial comments

When we first started this text we thought that the topics of personality, individual differences and intelligence were important in modern-day psychology. Today we are convinced that they are crucial. Not only do they serve modern-day psychology well, but the past and the future of psychology are bound up in these three areas. No other topic area in psychology has provided so many commonly used concepts and applications to psychology. No other

area of psychology can provide such controversy and emotion (for example, IQ testing, socially defined race differences in intelligence) while also providing such simple and eloquent answers to complicated questions (for example, the five-factor model of personality). Most of all,

no other area starts with the construction of the first intelligence test and invention of statistical tests, dabbles in the psycho-physiological properties of the brain and finishes by explaining how we love and forgive.

# ACKNOWLEDGEMENTS



## **Authors' acknowledgements**

We would like to thank the reviewers, of this and the previous editions. We would like to thank them especially for devoting their valuable time, incredible patience, and superb guidance and, not least, for always going beyond the call of duty in their help and advice.

Our thanks to Steven Muncer for the continued use of the 'Stop and Think' section in Chapter 23. We also thank

Rajvinder Lally for allowing our continued use of the concept and early work on the academic vindictiveness that is used in Chapter 23. For this edition, we would like to acknowledge the work of Radhika Joshi and Tamara Gheorghes for some very helpful literature reviews.

*John Maltby*

*Liz Day*

*Ann Macaskill*

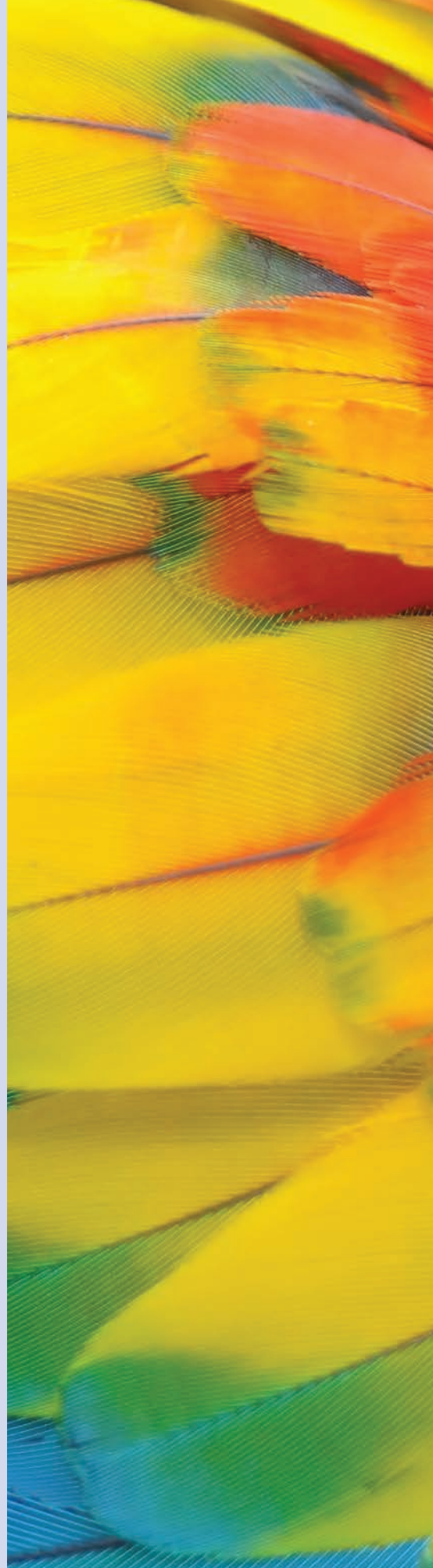


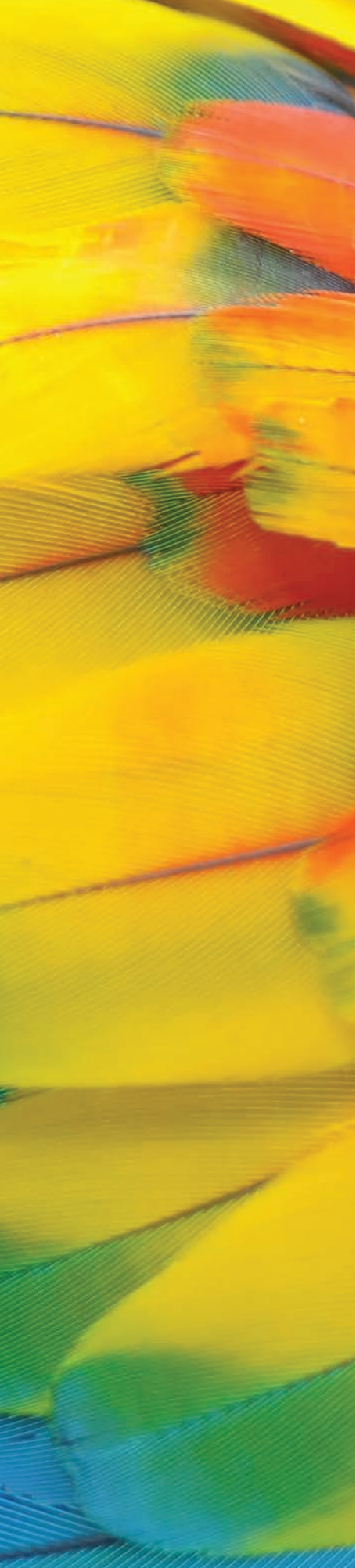


# PART 1

## Personality and Individual Differences

<b>Chapter 1</b>	Personality Theory in Context	2
<b>Chapter 2</b>	The Basis of the Psychoanalytic Approach to Personality	23
<b>Chapter 3</b>	Developments of Freudian Theorising	45
<b>Chapter 4</b>	Learning Theory Perspectives on Personality	73
<b>Chapter 5</b>	Cognitive Personality Theories	103
<b>Chapter 6</b>	Humanistic Personality Theories	127
<b>Chapter 7</b>	The Trait Approach to Personality	163
<b>Chapter 8</b>	Biological Basis of Personality I: Genetic Heritability of Personality and Biological and Physiological Models of Personality	194
<b>Chapter 9</b>	Biological Basis of Personality II: Evolutionary Psychology and Animal Studies of Personality	225





# CHAPTER 1

## Personality Theory in Context

### Key themes

- Nature of personality
- Implicit personality theories
- Definitions of personality
- Aims of studying personality
- Approaches to studying personality
- Describing personality
- Distinctions made in personality research
- Measurement issues
- Strands of theorising
- Reading critically and evaluating theory

### Learning outcomes

After studying this discussion you should:

- Appreciate why psychologists study personality
- Be aware of a variety of definitions of personality
- Understand the components of psychological definitions of personality
- Have developed an understanding of the historical roots of personality theory
- Understand the major questions that personality theories aim to address
- Understand the criteria that can be used to evaluate personality theories

## Introduction

One of us recently overheard two female students who were discussing the merits of their friend's boyfriend. One student concluded, 'I don't know what she sees in him; he has no personality whatsoever.' The other agreed vehemently with this statement. What is this poor guy actually like? This is not an unusual comment, and you may have used it yourself. Can an individual have no personality? How do you visualise someone who is described as having 'no personality'? Take a minute to think about it. We tried this out on a group of students and asked them what they thought someone was like who could be described as having no personality. They easily produced descriptions such as quiet, not a lot of fun, unassuming, geeky, not very sociable, no sense of

humour and dull. A few students even suggested that such people are unhappy looking, and others suggested that they dress in dull clothes.

Clearly the description of 'no personality' does not literally mean that the individual does not have personal characteristics of the type that we normally think of as being part of a person's personality; rather, it implies a certain sort of person. This then raises the issue of what we mean by personality. Firstly, following from our example, we will begin by looking at how non-psychologists, as opposed to psychologists, deal with personality. Then we will explore what psychologists mean by personality. At that point, some of the complexities of the topic area will become apparent.



Source: rawpixel/123RF

## General population perspectives: implicit personality theories

It is clear from the opening example that describing someone as having 'no personality' conveys meaning to most people; and, for our students at least, there was a fairly good consensus about exactly what it meant. This is an example of what psychologists call **implicit personality theories**. These are intuitively based theories of human behaviour that we all construct to help us to understand both others and ourselves. We hear descriptions of individuals and we observe people going about their business,

chatting with us and with others, and then we use this information to help us decide what sort of person we think they are. Most of the time we are not even consciously aware that we are doing this; it happens so frequently that it becomes an automatic response. In this way, we are all psychologists collecting data based on our observations of social situations. Human beings seem to have a natural curiosity about why people behave as they do. We use our observations to construct our implicit personality theories. These implicit theories are then used to explain behaviour.

For example, what about the student in your seminar group who never contributes to the discussion? Is it because of shyness, stupidity or laziness? How would you decide?



We make observations and then we infer cause and effect. We see the student in the bar surrounded by a large group of people, obviously the centre of attention, chatting and laughing; and we may conclude that this person is not shy. Sometimes we discuss it with our friends to compare their observations with ours. Someone may tell you that the silent seminar student won a business sponsorship to come to university. You may conclude that this rules out stupidity as a motivator for their behaviour. Are they lazy? Perhaps we think they are too arrogant to join in the discussion, that they find the level of debate beneath them intellectually. Therefore, we may have them down as either lazy or arrogant, and we look for confirmation in their subsequent behaviour in seminars. In this way, we make what are called causal inferences about behaviour. This means we assume that people behave the way they do because of the sort of people they are; it is down to their personality. Most people find it difficult to identify how they make these judgements. Think about how you do it if you find this hard to believe.

## Problems with implicit theories

Judging what other people are like is a skill that is valued. Think how often you hear people saying, 'I am a good judge of character'. We all like to think that we know about people, and most of the time our implicit theories of personality appear to work quite well in our everyday life – however, they are flawed in several ways. You may notice that we said implicit theories *appear* to work well, but a major difficulty with them is that we seldom have the opportunity to check them out properly. We decide to share our flat with Sarah and not Joanne, and therefore we never have the opportunity to see if Joanne is a good flatmate. If it turns out that we get along well with Sarah as a flatmate, we congratulate ourselves on being a good judge of character. Joanne might have been even better, but we will never know. In this way, our evaluation of the situation is flawed.

Implicit theories are also based on casual and non-random observations of individuals. By this, we mean that they are not based on observations of behaviour that have been systematically selected to portray accurately how that person spends his or her life. Instead, we have chance observations of other people. We can see this from the student seminar example. With most people, we sample only a tiny fraction of their behaviour; yet, based on this, we have to make decisions about whether we are going to pursue a friendship with them, give them a job or go out of our way to avoid them in future. If we decide not to pursue further contact with the individual, that is usually the end of the story. Implicit theories are not scientific theories of personality. Exactly what constitutes a scientific theory will be discussed later in the chapter. However, it should be

clear from these examples that some more reliable way of understanding individual behaviour and classifying people would be useful. Psychologists have set out to do this; and, as we shall see, they have developed a range of theories, all attempting to meet this need.

## How is personality defined?

Psychologists need to be very clear about exactly what they are studying and define it precisely if they are going to measure it effectively. One difficulty that frequently arises is that many of the words used by psychologists are already part of our everyday language or have been adopted into normal language use. However, it is still important to consider what the public (as opposed to psychologists) think that a term means so that accurate communication can occur. In most instances public, or lay, definitions tend to be very wide and not specific enough for psychologists to use for research purposes to define precisely what they are examining. However, lay definitions provide a good starting point for developing psychological definitions.

## Lay definitions of personality

Lay definitions of personality frequently involve value judgements in terms of the social attractiveness of individuals. Sometimes the emphasis is on aspects of the individual's physical appearance, perhaps with some comments on their social style. This view produces the following personality description: 'Richard is tall and fairly attractive, but never has much to say for himself although he can be very funny with people he knows well.' Such definitions are essentially evaluations of individuals and include relative judgements, in this instance about height and attractiveness. This definition also includes some judgements about how Richard interacts with others: 'never has much to say for himself although he can be very funny with people he knows well'. The elements of descriptions or judgements made about the person when they are in social settings are common elements. These lay definitions are commonly linked to the implicit personality theories that we discussed earlier. Sometimes they include elements of folklore within particular cultures. This may be an assumed match between a physical attribute and a personality attribute. Common examples are that people with red hair also have fiery tempers or that fat people are jolly.

From lay definitions of personality, it seems that personality is judged in a social context; that is, it has elements about how well people get on with others and their style of interacting as well as comments on their appearance. Does this mean that our personality is apparent only in social situations? This is obviously not the case. When people are



alone, they still display individual differences in terms of how they cope with solitude and their attitude towards it. For most people their personality is an integral part of their being, which exists whether they are alone or with others.

## Psychological definitions of personality

Psychological definitions of personality differ from lay definitions in that they define personality in terms of characteristics, or the qualities typical of that individual. Gordon Allport, a prominent early figure in personality psychology, popularised the term ‘personality’ and provided a definition in 1961. He defined personality as ‘a dynamic organisation, inside the person, of psychophysical systems that create the person’s characteristic patterns of behaviour, thoughts and feelings’ (Allport, 1961, p. 11).

This dense definition requires some unpacking. *Dynamic organisation, inside the person* refers to a process that is continually adjusting, adapting to the experiences we have, changes in our lives, ageing and the like. In other words, personality is conceptualised as being an active, responsive system. It is conceptualised as being organised in some sort of internal structural system, the details of which are not yet quite clear – although hypotheses abound, as you will see in later chapters. *Psychophysical systems* refer to the inclusion of both our minds and our bodies in what we refer to as personality. In somewhat crude terms, the psychological elements in the mind interact with the body sometimes in complex ways to produce behaviour. *The person’s characteristic patterns* suggest that something relatively stable is being produced that becomes typical of that individual. The implied stability is important; without it, all attempts at measuring personality would be futile. *Behaviour, thoughts and feelings* refer to the fact that personality is a central component influencing, and being discernible in, a wide range of human experiences and activities.

While this is only one of a multitude of definitions, it includes some important elements and is reasonably comprehensive. Personality theorists are still struggling to produce a universally acceptable definition of personality. Part of the problem arises from the concept being so wide, which makes it difficult to conceptualise succinctly. It has to embrace and account for individual differences between people, their genetic inheritance and the internal processing that occurs within individuals, leading them to behave in the ways that are characteristic of them. Despite the lack of a single agreed-upon definition, some agreement has emerged about what constitutes personality. There is consensus that the term ‘personality’, as now used, describes a **psychological construct**; that is, a mental concept that influences behaviour via the mind–body interaction. As an understanding of what constitutes a psychological construct and how it is identified is important for your understanding of psychological theory, a fuller description is

given in ‘Stop and think: Defining and testing psychological constructs’.

## The aims of studying personality

Psychologists are interested in what people are like, why they behave as they do and how they became that way. Underlying these apparently simple issues are more profound questions about human beings as a species, as we shall see when we address these issues later in this text. To put it in more academic language, personality theorists seek to explain the **motivational basis** of behaviour. Why do individuals behave as they do? What gets us up every morning? Why are you studying for a degree? Basically, personality theorists have to address the question of what drives our behaviour. This question of motivation necessarily touches on crucial issues about the *basic nature* of human beings. Do we behave in certain ways because we have little choice? As a species, are we innately aggressive and self-destructive? What are the basic human drives? Some personality theorists, such as the psychoanalyst Sigmund Freud (Chapter 2), adopt the view that human nature is essentially, innately self-destructive and aggressive. Other theorists such as Carl Rogers, an American who is often seen as one of the founding figures of counselling psychology (Chapter 6), see human nature as being benign. Rogers claims that human beings are driven by positive motives towards growth and self-acceptance. We shall explore this in more detail later and see that there is a range of views. The quality of human nature, however, is a fundamental question that has to be addressed by personality theorists. Are we benign or malevolent as a species? As yet there appears to be no definitive answer.

As well as addressing issues of human motivation and the nature of human beings, personality theorists aim to *provide descriptions or categorisations of how individuals behave*. This is addressed in different ways, but the aim is to understand why individuals behave as they do. Implicit here is some level of acceptance in most, but not all, theories that there is a finite range of possible behaviour and that some patterns of behaviour are shared by individuals with similar personalities. Hence types or categories of personalities are outlined as part of many theories. Linked to the idea of classifying types of personality is the issue of **measuring personality**.

Closely linked to this question of what people are like is the issue of how they become that way. Theories pay different attention to this issue, with some theoretical approaches encompassing detailed **developmental theories** while others are much more schematic in their treatment of how personality develops. Within developmental theories there are diverse views about the age at which personality becomes

## Stop and think



### Defining and testing psychological constructs

Psychological constructs refer to concepts that are not directly observable but are hypothesised to be influential in determining or explaining behaviour. We do not directly observe personality, for example, but our theory is that personality plays an important role in determining behaviour. Our observations are of behaviour; and from these observations, we infer that the individual has a certain personality characteristic or type of personality. In this way personality is a psychological construct. To determine that a particular phenomenon is a psychological construct and not merely a chance observation, it is necessary to demonstrate that it can be reliably measured and is relatively stable across time, among other things.

Lee J. Cronbach (1916–2001), Professor of Education at Stanford University in the United States, spent most of his long career examining issues related to the identification and measurement of psychological concepts. In 1955 he published, with Paul Meehl, what has come to be seen as a classic seminal paper in psychology. The authors propose a method for establishing the validity of psychological constructs in personality tests. Paul Meehl (1920–2003) was a Professor of Psychology at the University of Minnesota in the United States and, like Lee Cronbach, he was concerned with investigating how reliably psychologists could predict behaviour. The joint paper by Cronbach and Meehl is heavily quoted within

the psychological literature. The following are the authors' three essential steps for establishing the validity of a psychological construct.

- Describe the characteristics that make up the construct and suggest how they may be related to each other based on some underlying theoretical speculation. For example, take the construct of extraversion. Extraverted individuals are described as being outgoing, friendly and warm. These are all characteristics that are hypothesised to promote social interaction. The theoretical speculation is that extraverts like and need higher levels of social interaction.
- Ways of measuring the suggested characteristics of the construct are then developed. For our example this would involve developing measures of 'outgoingness', friendliness and warmth.
- Finally, the hypothesised relationships are tested. In our example we would expect to find that individuals who scored highly on outgoingness also scored highly on friendliness and warmth and that these individuals all liked interacting with other people. Finding these relationships would result in a valid concept. Cronbach and Meehl were keen to emphasise that establishing the validity of psychological concepts is an ongoing process that may have to be revisited as our knowledge within psychology expands.

fixed. Is your personality fixed at age 2, or is it age 5 or older, or is change always possible?

There are diverse views on this aspect. Even within some of the clinically derived theories, like the psychoanalytic ones that see personality development as occurring in early childhood, change is considered to be possible but is assumed to be difficult to achieve. Some theorists, as you will see, suggest that interventions such as psychotherapy or counselling can facilitate this change. Conceptualising therapeutic interventions in this way makes it easier to understand why so many personality theories have been produced by psychologists and psychotherapists who are in clinical practice. Their interest is in understanding individuals so that interventions to assist in behaviour change can be developed.

Closely related to the development of personality is the issue of **heritability versus environment**. Is personality development determined more by genetic inheritance or environmental influences, or is it some sort of interactional effect? Theories differ, as we shall see in this text, in terms of the role they give to each, and some theories do

not really address this issue. Trait theorists and biological theorists tend to have more to say on genetic influences on personality.

Personality theory developed within psychology originally to help us understand mental illness and abnormal behaviour. We will examine the details of this effort later, when different theorists are presented. At this point it is enough to know that to study and classify the experiences of psychologically disturbed people, it is necessary to have a concept of what is normal in human behaviour. Without some idea of what constitutes the normal range of human behaviour, it is impossible to make judgements about what is abnormal. From this early work, it soon became apparent that there are huge individual differences in human behaviour and we will return to this later. However, some of the early personality theorists began to see that there are patterns in human behaviour and that it is possible to classify types of human personality. This led to the measurement of personality and the development of personality questionnaires. This will be examined in detail in later chapters. As you are now aware, psychologists

- Explain the motivational basis of behaviour
- Ascertain the basic nature of human beings
- Provide descriptions/categorisations of how individuals behave
- Measure personality
- Understand how personality develops
- Foster a deeper understanding of human beings to assist in the development of interventions to facilitate behaviour change
- Assess the effects of heredity versus environment

**Figure 1.1** Summary of the aims of studying personality.

have many reasons for studying personality; we have summarised these aims in Figure 1.1 to help you remember them.

What we have not yet considered is where the term ‘personality’ originated. In many courses, historical aspects of psychology are addressed within individual modules. To facilitate this approach, we will include some relevant material such as the history of core terms.

### The source of the term ‘personality’

The word ‘personality’ derives from the Latin *persona*, meaning ‘mask’ (Kassin, 2003). It was the famous, pioneering, American psychologist Gordon Allport who popularised the term with the publication in 1937 of *Personality: A Psychological Interpretation*. Prior to this a variety of terms, such as ‘character’ or ‘temperament’, were commonly used. Allport carried out a survey of the ways in which the concept of personality has been defined; he identified over 50 different ways. These varied from lay

common sense understandings to sociological, philosophical, ethical and legal definitions. Allport argued that many of the existing terms were value-laden in the way that they were used. Examples would be a description of a woman of good character or a man of bad character. Within a particular cultural setting, this description would take on a specific meaning that was generally shared. Allport felt it was necessary to develop a consensus on the use of a word that would describe individual uniqueness without implying an evaluation of that uniqueness. As a result of Allport’s influence, ‘personality’ increasingly became the term used across the discipline to describe individual differences. A few theorists, mainly psychometricians, used the label of ‘individual differences’, and this usage continues to some extent. Psychometricians are concerned with the development of good, accurate measures of individual differences. In these instances of ‘individual differences’, it is frequently really an abbreviated form of ‘individual differences in personality’ or variables related to personality. You will already be getting the idea that there are a



Is it important to understand the basic nature of human beings?

Source: Shutterstock

variety of approaches to studying and researching personality; we will now look at some of them.

## Approaches to studying personality: idiographic versus nomothetic

An important distinction made by Allport in his early work on personality was between **idiographic** and **nomothetic** approaches to personality. The idiographic approach focuses on the individual and describes the personality variables within that individual. The term comes from the ancient Greek *idios*, meaning ‘private or personal’. Theorists, who adopt this approach in the main, are only interested in studying individuals one at a time. They see each person as having a unique personality structure. Differences between individuals are seen to be much greater than the similarities. The possible differences are infinite. Idiographic approaches produce a *unique understanding* of that individual’s personality.

The single case study method is generally the research method of choice for idiographic approaches to personality theorising. The aim is to develop an in-depth understanding of a single individual. For example, Freud used the idiographic approach to study his patients. He developed a detailed description of each patient based on his observations of that patient during treatment. He would make notes on the patient after each treatment session, reviewing and revising his previous notes as his knowledge of the patient increased. He then wrote up the session notes as a clinical case study describing that particular patient.

Idiographic approaches mainly use qualitative research methodologies, such as interviews, diaries, therapeutic sessions or narratives, to collect data on an individual. Some personality theorists do not go beyond this focus on the individual, as they truly consider each person to be unique and deny the existence of types of personality. Others will make some generalisations about human behaviour based on studying a number of case studies. They may observe from a series of case studies that there are similarities in the way that some individuals behave. Freud, for example, produced his personality theory based on his observations of dozens of patient case studies. The clinical case study approach has been used mainly by idiographic personality researchers.

In contrast, the nomothetic approach comes from the ancient Greek term for ‘law’ and is based on the assumption that there exists a finite set of variables that can be used to describe human personality. The aim is to identify these personality variables or traits that occur consistently across groups of people. Each individual can then be located within this set of variables. By studying large groups of people on a particular variable, we can establish the average levels of that variable in particular age groups, or in men and women, and in this way produce group averages

– generally called **norms** for variables. Individuals can then be described as being above or below the average or norm on a particular variable. Thus, when a friend who is very outgoing and friendly is rated as being an extravert on a personality test, it means that her score was higher than the average on the variable called extraversion. The variable ‘extraversion’ is measured by asking questions about how sociable and assertive she is. This approach, while acknowledging that each person will possess different degrees of particular personality traits, concentrates on the similarities in human personality. One aim of the nomothetic approach is to identify a universal set of variables that will underpin the basic structure of human personality. We will visit this concept in considerably more detail when we look at trait theorists (Chapter 7).

There are advantages and drawbacks to each approach, and we have summarised these in Figure 1.2.

There is a long-standing debate about the relative merits of idiographic versus nomothetic approaches; it applies to many subject areas within psychology, not just to personality theorising. A common issue for students, however, is remembering which is which. You may find it useful to remember ‘**I**’ for **I**diographic and **I**ndividual.

Two celebrated personality researchers, Charles Carver and Michael Scheier, have discussed this issue at some length. Carver and Scheier (2000) argue that within personality theorising, the distinction between idiographic and nomothetic is not clear-cut. They argue that psychologists adopting the nomothetic approach still accept the uniqueness of individuals. However, they do not accept that there is an infinite number of personality variables. They see that there is an underlying common structure of personality with an associated finite number of personality variables. The uniqueness of the individual comes from their particular mix of variables from the finite set. It is how these personality variables are combined that makes each individual unique. Some idiographic researchers also go beyond the focus purely on the individual. They collect sets of case studies, for example, and then identify common themes across these case studies. In this way, they can generate theories and make predictions that can be tested, often by using nomothetic approaches.

## Describing personality

Individuals are described as having certain degrees of happiness, activity, assertiveness, neurosis, warmth, impulsiveness and so on. Physical descriptions, unlike lay definitions, are rarely included in psychological definitions. The focus is on identifying psychological as opposed to physical characteristics on which people differ. These characteristics are measured in specific populations, and the mean (average) levels of occurrence are calculated. This might be done



Feature	Idiographic	Nomothetic
<b>Strategy</b>	Emphasises the uniqueness of individuals	Focuses on similarities between groups of individuals. Individuals are unique only in the way their traits combine
<b>Goal</b>	To develop an in-depth understanding of the individual	To identify the basic structure of personality and the minimum number of traits required to describe personality universally
<b>Research methodology</b>	Qualitative methodologies to produce case studies mainly. Some generalisation across series of case studies is possible	Quantitative methods to: <ul style="list-style-type: none"> <li>• explore the structures of personality</li> <li>• produce measures of personality</li> <li>• explore the relationships between variables across groups</li> </ul>
<b>Data collection</b>	Interviews, diaries, narratives, treatment of session data	Self-report personality questionnaires
<b>Advantages</b>	Depth of understanding of the individual	Discovery of general principles that have a predictive function
<b>Disadvantages</b>	Can be difficult to make generalisations from the data	Can lead to a fairly superficial understanding of any one person. Training needed to analyse personality profiles accurately

**Figure 1.2** Comparison of idiographic and nomothetic approaches to the study of personality.

separately for men and women and for different age groups. A study might, for example, give a mean level of anxiety separately for men and women aged between 20 and 29, another for men and women aged between 30 and 39 and so on. These calculations give the **population norms** for that particular characteristic.

Population norms represent the mean scores that particular groups of individuals score on a specific test. For example, they allow you to compare the test score on anxiety for a woman between ages 20 and 29 with the mean levels for her age group of women. You can then conclude that her anxiety score was either above or below the average for her age group as well as comparing her with other individuals in your sample. This information gives profiles of individual differences that are then frequently used to define types of personalities. As we shall see (Chapter 7), trait theorists frequently develop population norms.

## Distinctions and assertions in personality research

Personality is perceived to be a relatively stable, enduring, important aspect of the self. People may act differently in different situations, but personality will have a major influence on their behaviour. For example, someone who is classified as being extravert will behave in a more outgoing fashion than a person who is introverted, regardless of the social situation. The differences in social behaviour between the two will be observable whether they are at a party or a funeral tea. Personality characteristics in this way are thought to exert a relatively consistent influence on

behaviour in different situations. Personality characteristics in this way are **enduring** across different social contexts.

While it is accepted that individuals can and do change over time, there is a contention that personality is **relatively stable** over time. People may learn from their mistakes and change their behaviour; but the more profound the change, the longer it generally takes. Changing aspects of ourselves is typically not easy, as counsellors and therapists will attest. It tends to take considerable time and effort for individuals to change aspects of themselves, if indeed they are successful. Expert help is frequently needed from counsellors or therapists before change is achieved.

Related to this contention is the fact that *not all differences between individuals are considered to be equally important* by personality theorists. The English language allows us to make fine distinctions between individuals. Another contribution made by Gordon Allport was to identify the number of words in an English dictionary that describe areas where individual differences are possible. In 1936, Allport and his colleague Odbert listed 18,000 such words, suggesting that over 4,500 of these appeared to describe aspects of personality. Of course, many of these were synonyms. Psychologists, through their research over time, have identified the personality characteristics that can be reliably assessed, where differences make most impact on behaviour and are most consistent over time. These are considered to be the *important* personality characteristics, and they are listed in Figure 1.3. The figure includes what are considered to be the major structures of personality and the main subdivisions within each. Observant readers may note that the first letters of major structures make up the