

# CONTENT CHANGES

*Psychology in Everyday Life*, Fifth Edition, includes 900 new research citations dated 2016–2019, a **new Student Preface**—Student Success: How to Apply Psychology to Live Your Best Life, new “In Your Everyday Life” and “Improve Your Everyday Life” features, line-by-line wording improvements, a fresh new design, and **182** compelling new photos, cartoons, and other illustrations. This new edition’s LaunchPad resources include “Assess Your Strengths” self-assessment activities, “How Would You Know?” research activities, Topic Tutorial: PsychSim6 activities, 120 new Concept Practice activities, new “Thinking Critically About” infographic activities, a new animation from David Myers on “Thinking Critically in Our Post-Truth World,” and a truly mobile e-book. Achieve Read & Practice also offers an affordable, simplified e-book/adaptive quizzing option.

In addition, you will find the following, significant content changes in this new fifth edition.

## CHAPTER 1: Psychology’s Roots, Critical Thinking, and Self-Improvement Tools

### Psychology Is a Science

- *Critical thinking* and the scientific attitude now frame and enhance a more effectively organized, expanded discussion of psychology’s early years through to the dynamic field it is today.
- Improved infographic on how critical thinking feeds the scientific attitude, establishing these as foundational principles of psychological science.
- New data on women in psychology, and new comparative photo example illustrates “Yesterday’s lack of diversity.”
- More detailed history of psychology now

includes *functionalism* and *structuralism*.

- New photo illustrates the varied careers of those who pursue psychology.
- Expanded and reorganized discussion of today’s psychology.
- Discussion of clinical psychology includes *counseling psychology*, *psychiatry*, and *community psychology* as new key terms.

### The Need for Psychological Science

- New research on how perceiving order in random events helps reduce anxiety.
- Major new section on Psychological Science in a Post-Truth World discusses the influences of false news, repetition, availability of powerful examples, and group identity and the echo chamber of the like-minded.

### How Do Psychologists Ask and Answer Questions?

- Scientific method discussion now better frames how theories advance science.
- New research on how psychological science and other disciplines benefit from *replication* and greater sharing of research methods and data, with *pre-registration* a new key term.
- New research on the explosion of online “big data” methods in naturalistic observation.
- New survey research on millennials and sex, and new global data on belief in alien civilizations.
- New example of correlation of number of Nobel laureates to chocolate consumption, and a new infographic—Thinking Critically About: Correlation and Causation—reinforce understanding of cause-effect.
- Improved differentiation of *random sampling* from *random assignment*.
- Improved section outlines how to choose the best research design, encouraging students to try this hands-on with the “How Would You Know?” LaunchPad research activities.

### Psychology's Research Ethics

- New honeybee research on stress illustrates how animal research reveals principles common to humans.
- Updated discussion of psychological science's codes for research ethics.
- New research on reality TV "experiments."
- Values in Psychology discussion includes new illustration of ground-breaking psychologists Kenneth Clark and Mamie Phipps Clark.

### Using Psychology to Improve Your Life and Become a Better Student

- Introduces new integrated theme for this edition: *Think* critically, *Consider* diverse perspectives, and *Improve* your everyday life.
- Updated discussion of ways to improve information retention and increase academic success; new research reinforces value of the *testing effect* and importance of active retrieval.
- Chapter now concludes by encouraging students to use this book to improve personally and academically.

## CHAPTER 2: THE BIOLOGY OF BEHAVIOR AND CONSCIOUSNESS

- New "brain-transplant" introduction illustrates the biopsychosocial approach to understanding the brain and mind, and how our traits are enabled by the interaction of nature and nurture.

### The Power of Plasticity

- Revised section with new examples emphasizes our developing understanding of neural *plasticity*.

### Neural Communication

- *Cell body* is a new key term.
- Improved explanation of neural transmission.

### The Nervous System

- New example of ballistic missile threat to

Hawaii illustrates ANS arousal.

- Improved explanation of neural networks.

### The Endocrine System

- Improved comparison of endocrine and neural messages and explanation of the pituitary's role.

### The Brain

- Updated photo of PET scan.
- New discussion of the brain imaging technique of *MEG* (*magnetoencephalography*).
- New table describes five types of neural measures (EEG, MEG, etc.), with research examples for each.
- New information on brain mapping and the Human Connectome Project.
- New analogy clarifies the role of the thalamus.
- New research on the role of the reticular formation in multitasking.
- New research on the brain's reward circuits and their role in human pleasure.
- Improved figure showing the body's cross-wiring.
- New photo of USA women's soccer player illustrates the role of the cerebellum in coordinating voluntary movements.
- New research examples on the role of the hippocampus in the limbic system.
- New photo example and research on head trauma in professional football.
- New figure with paired fMRI scans vividly illustrates effects of the drug LSD.
- Discussion of association areas updated with new research examples.
- New explanation of "functional connectivity" and its role in memory, language, and attention.
- Improved discussion of plasticity in terms of the brain's response to damage, with new research examples.

### Brain States and Consciousness

- New research on the use of magnetic stimulation to detect consciousness in unresponsive patients.
- New research on the brain activity underlying conscious awareness.
- In *dual processing* discussion, *parallel processing* is now contrasted with *sequential processing*.
- Updated discussion of digital distraction while driving, with new research and traffic accident statistics.
- Improved discussion of *inattentional blindness*, with updated figure demonstrating *change blindness*.
- New research on the evolutionary advantages of older adults' more fragile sleep.
- Sleep-stage names updated to reflect growing scientific usage of briefer names (N1 for NREM-1, N2 for NREM-2, etc.).
- New research on REM sleep and dreaming.
- New research on the difference in sleep cycle length for younger and older adults.
- New photo of refugees powerfully illustrates the protection that communal sleeping can provide.
- New research on cultural influences on sleep patterns.
- New research on how sleep helps repair brain tissue and strengthen memories.
- New example of sleep apnea's role in train crash demonstrates the dangers of sleep deprivation.
- New research illustrates the benefits of later school start times.
- Advice on improving sleep habits updated to appeal to a broader swath of readers.
- New research on the effects on dreaming of sexual media content.
- New research illustrates the limitations of Freud's dream theory.
- Updated figure on sleep deprivation's effects.

- Updated table on improving sleep.

## CHAPTER 3: DEVELOPING THROUGH THE LIFE SPAN

### Developmental Psychology's Major Issues

- Improved figure illustrates the stage theories of Kohlberg, Erikson, and Piaget.
- *Cross-sectional* and *longitudinal studies* are now defined earlier, in opening section, to frame the full chapter.
- New research suggests children's cruelty to animals predicts violent behavior in adulthood.

### Prenatal Development and the Newborn

- New research on how our differing traits are influenced by "many genes of small effect."
- New epigenetics research, with new photo example of epigenetic effects of forced family separation playing out over generations.
- New author photo example illustrating our predisposition to nourish our children.
- Additional research on epigenetic effects of maternal drinking, use of nicotine and other drugs, and extreme stress during pregnancy.
- New evidence of preference for face-like patterns even in late-stage fetuses.
- New research on identical twins creating shared experiences, with new photo of space study with identical twins Scott Kelly and Mark Kelly.

### Infancy and Childhood

- New research on lack of stimulation impeding normal brain and cognitive development.
- Brain development discussion of critical periods now elaborates on neural plasticity.
- New cross-cultural research on the effects of even very brief, early language exposure.
- Expanded coverage of Vygotsky's theory of how children think and learn, with *scaffold* as a new key term and a new personal

example from the author.

- New research on how developing a *theory of mind* helps children empathize, leading them to be helpful and well-liked.
- Concept of theory of mind now better frames discussion of *autism spectrum disorder*, with much new research, including on gender differences.
- New global research on the importance of touch in parent-infant interaction.
- New research on temperament and attachment.
- Includes new research on father care predicting health and well-being.
- New research shows effects of abuse and conflict on childhood brain development, and epigenetic marks left by child abuse.
- New research on childhood adversity and resilience when facing future stresses.
- Improved infographic—Thinking Critically About: Parenting Styles—Too Hard, Too Soft, Too Uncaring, and Just Right?
- New cross-cultural research on culture and child raising.

### **Adolescence**

- New research on lengthening period of adolescence in Western cultures, and on early maturation and the risk of anxiety or depression.
- Developing Morality section updated with new research, including cross-cultural findings.
- New photo example of formal operational teens demonstrating reasoning power in post-Parkland school walkouts.
- New photo example of moral reasoning in the face of disaster.
- Expanded discussion of what enables us to delay gratification (including the latest updates on Mischel's findings) and on advantages this ability affords.
- New examples and research update discussion of adolescent identity formation,

including on self-esteem, as related to social media, and in bicultural teens.

- New research on adolescents' superior recognition of peer, not adult, faces, and on teen social media use.
- New research example of separated identical twins vividly illustrates parental influence on adopted children.
- New adolescent trends data, including on rising percentage of 25- to 35-year-old Americans living in parental home.

### **Adulthood**

- New research on the benefits of exercise in older adults.
- New photo example of technology allowing the young to experience effects of old age.
- Maintaining Mental Abilities section includes new research on lifelong brain plasticity, including new research on controversial brain-training programs.
- New research on rising expectations when choosing a partner.
- Includes new research on positivity in older adults.
- New author example of sudden grief; with new research on resilience following a loss.
- New research on positive feelings in those facing imminent death.

## **CHAPTER 4: SEX, GENDER, AND SEXUALITY**

- Chapter 4 has been extensively reviewed and updated to ensure the currency, accuracy, and inclusivity of all language, terminology, art, and pedagogy.
- New quote in the chapter intro from writer Jan Morris describes the experience of being transgender.

### **Gender Development**

- Discussion of social connectedness updated with new research, including on gender

differences in social media use, employment and life satisfaction, and problem solving.

- New research and cartoon explore the *male answer syndrome*.
- New research on the influence of genes and environment on the timing of puberty.
- Thinking Critically About: Gender Bias in the Workplace infographic updated with current data.
- New photo illustrates height differences in teens.
- Discussion of sexual development variations includes new examples of Turner syndrome and Klinefelter syndrome.
- Improved discussion of sexual development variations provides further details on the David Reimer case.
- New photo example of Olympic gold medalist Caster Semenya.
- Discussion of gender roles updated with new research on the Draw-A-Scientist test, women in the STEM fields, and cultural attitudes toward *sexual aggression* (now a key term).
- New infographic—Thinking Critically About: Sexual Aggression.
- Discussion of gender identity now includes the terms binary, non-binary, and cisgender.
- New photo example illustrates the lift of Saudi Arabia’s ban on women driving.
- New research shows the impact of fathers’ equal participation in housework on daughters’ employment aspirations.
- Discussion of transgender individuals updated with new research on gender identity, gender dysphoria, social acceptance and harassment, and the benefits of affirming one’s gender identity.
- New photos of Chaz Bono and Jamie Shupe, the first American to be legally recognized as non-binary.

### Human Sexuality

- Alfred Kinsey added to discussion.

- New coverage of *paraphilias*, with new key term.
- Discussion of STIs updated with information on common infections and prevention.
- New photo accompanies figure illustrating biopsychosocial influences on sexual motivation.
- Updated discussion of the effects of exposure to sexually explicit material.
- Updated photo illustrates hypersexualization in video games.
- New research on cross-cultural attitudes toward premarital sex.

### Sexual Orientation

- New research on distress and suicide risk among gay and lesbian teens lacking social support.
- New coverage of pansexual orientation, with photo of musician Roes.
- Updated data on rates of heterosexual, bisexual, and same-sex attractions, with new research demonstrating the influence of social acceptance on the accuracy of self-reports.
- New research on legislation against “conversion therapy.”
- New research on the health and emotional well-being of children raised by gay or lesbian parents.
- New research on the genetics of sexual orientation, including the potential influence of epigenetic marks.
- New research on the influence of prenatal hormones on sexual orientation.
- Includes preliminary new research on women’s greater sexual fluidity.
- New research on the relationship between seeing sexual orientation as inborn and supporting equal rights for people who are gay, lesbian, or bisexual.

### An Evolutionary Explanation of Human Sexuality

- New research on sexual interest levels in older Americans.
- New photo example of George and Amal Clooney.

### **Sex and Human Relationships**

- Reframed discussion includes new research on the connections among sexual desire, intimacy, and commitment, and the relationship between sex and marital satisfaction.

### **Reflections on the Nature and Nurture of Sex, Gender, and Sexuality**

- New example and data update discussion of the ways in which gender roles are merging.

## **CHAPTER 5: SENSATION AND PERCEPTION**

### **Basic Concepts of Sensation and Perception**

- *Sensory receptor* is now a key term.
- Improved infographic—Thinking Critically About: Subliminal Sensation and Subliminal Persuasion.
- New *sensory adaptation* research on the attention-grabbing power of changing stimulation from smartphones.
- New examples of *perceptual set*, and new research demonstrates the influence of context, motivation, and emotion on perception.
- New examples of the power of expectations on our perceptions.

### **Vision: Sensory and Perceptual Processing**

- New figure demonstrates contrast between focused detail and less distinct peripheral information.
- New research on taxi color's influence on collision rates, and new figure illustrates red-green color-deficient vision.
- Color-deficient vision (more common in men) is contrasted with tetrachromatic color vision (more common in women).
- New research on facial perception and effects of fusiform face area stimulation.

- New photo example illustrates supercell feature detectors in action.
- New combined figure illustrates three principles of grouping.
- New photo illustrates an illusory 3-D crosswalk.
- New art effectively illustrates linear perspective.
- New research on cataract removal in children who are blind, and on those who have gained sight later, demonstrates critical period for vision.

### **The Other Senses**

- New research on how people seem more thoughtful, competent, and likable when we hear their words rather than just read them, and on increased risk of depression in those with hearing loss.
- New art illustrates high- and low-pitched musical instruments.
- Example of new world record for noisiest indoor stadium illustrates decibel levels.
- New research on affectionate touch and well-being.
- New research supports the gate-control theory of pain, and pain as a biopsychosocial event.
- New photo example of athlete playing through pain; new research supports maximizing pain relief by combining a placebo with distraction, and amplifying their effects with *hypnosis*.
- New research on how taste buds collect food chemicals and release neurotransmitters.
- New research on how complex combinations of olfactory receptors trigger different neural networks.
- New research on how women's stress levels drop when smelling their romantic partner's scent, and on odor aversions, including how mice respond to a predator's scent.
- New demonstration allows students to experience how much speedier their

vestibular sense is than their vision.

### **Sensory Interaction**

- New research demonstrates how the senses eavesdrop on one another and interact.
- New examples of *embodied cognition*, including research on the influence of physical warmth on social warmth.
- Updated Summarizing the Senses table.

### **ESP—Perception Without Sensation?**

- Belief in ESP among Americans updated with new survey research.
- New examples of incorrect psychic predictions.

## **CHAPTER 6: LEARNING**

- Introduction now describes how Oprah Winfrey’s adaptability and eagerness to learn led her from tremendous adversity to awe-inspiring success.

### **How Do We Learn?**

- Improved figure illustrates operant conditioning.

### **Classical Conditioning**

- New research on generalized fear of car collisions.
- New example illustrates *discrimination*.
- New neuroscience support for Pavlov’s work shows a time-ordered relationship between a conditioned warning signal and an unconditioned threat.
- New research on classical conditioning and cravings for sweet foods.
- New research questions Watson’s evidence for Little Albert’s conditioning.

### **Operant Conditioning**

- New example of behavior shaping in animals that can sniff out land mines or locate people amid rubble.
- Includes advice for students on using operant conditioning principles to shape their own behavior.

- New photo demonstrates that what animals and people find reinforcing varies.
- New research on the benefits of frequent quizzing for students’ learning.
- New research on the relationship between delayed gratification and later achievement.
- New survey data shows Americans’ persisting support for physical punishment of children, despite research showing its ineffectiveness in correcting behavior.
- Discussion of punishment improved with new examples and research on the drawbacks of physical punishment and the efficacy of laws prohibiting it.
- New quote from B. F. Skinner on his belief that brain science should be independent from a science of behavior.
- New example of General Motors CEO Mary Barra’s reinforcement of employee performance demonstrates the use of operant conditioning principles in the workplace.
- New photo example of Notre Dame coach Muffet McGraw illustrates the effectiveness of immediate reinforcement in sports coaching.
- New research demonstrates the impact of immediate rewards on people’s persistence toward long-term goals.

### **Biology, Cognition, and Learning**

- Streamlined, improved discussion of biological limits on conditioning.

### **Learning by Observation**

- New photo of Albert Bandura receiving U.S. National Medal of Science.
- New research illustrates how viewing prosocial acts and prosocial media boosts helping behaviors.
- Includes new research on the antisocial effects of antisocial models in observational learning.
- New research shows impact of *The Fast and the Furious* movies on speeding.

## CHAPTER 7: MEMORY

- Chapter begins with new example of exceptional memory.

### Studying Memory

- Updated research and improved figure illustrate the modified three-stage processing memory model.

### Building Memories: Encoding

- Short-term memory capacity discussion updated and improved, with new research.
- New research on the benefits of chunking information.
- New research supports the *spacing effect* and the *testing effect*.
- New research on making material personally meaningful, including cross-cultural findings on self-relevant and family-relevant information.

### Memory Storage

- Limitless memory storage capacity indicated in new neural research.
- New research on memory improvement in children as hippocampus grows.
- Activity detected as people form explicit memories in new brain imaging research.
- New research supports sleep's role in *memory consolidation*.
- New example of the role of rehearsal in clearly remembered personal or dramatic experiences.
- New research on learning and *long-term potentiation (LTP)*.

### Retrieval: Getting Information Out

- Now includes Wechsler Memory Scale (WMS-IV).
- New high school memory photo example.
- New research shows that memory for faces among other animals includes even fish.
- New retrieval cue tip, and new material on prospective and retrospective memory.
- New key term—*encoding specificity principle*.

- New research on the *serial position effect*.

### Forgetting

- Discussion of amnesia now distinguishes between *anterograde* and *retrograde amnesia*.
- New research on those with “super memories” and why some people have such difficulty forgetting.
- Includes new research on how to minimize *retroactive interference*.
- New author example of positive transfer.
- New research on how trauma releases stress hormones that cause people to remember even what they wish to forget, with vivid new photo example.

### Memory Construction Errors

- New research on how even those with exceptional memories sometimes make mistakes.
- New research on *reconsolidation*.
- New research on clinical efforts to help people forget unwanted memories.
- Includes new research on the *misinformation effect*, with new examples demonstrating how repeatedly imagining actions and events (or even telling lies) can create false memories.
- New research on how memory construction errors arise from misuse of familiar information, with photo examples.
- New research on *source amnesia* with new examples.
- Updated data on faulty eyewitness identification, and new research on children's testimony and how to improve accuracy.
- Improved infographic—Thinking Critically About: Can Memories of Childhood Sexual Abuse Be Repressed and Recovered?

### Improving Memory

- New research on the benefits of the production effect over simply rereading information, and on the distraction effect of

laptops in classrooms.

- Updated tips and expert recommendations for effective study habits, tied to the research and concepts in the chapter.

## CHAPTER 8: THINKING, LANGUAGE, AND INTELLIGENCE

### Thinking

- New example clarifies the importance of concepts.
- New cartoon illustrates *confirmation bias*.
- Improved explanation of *functional fixedness*, with revised key term (was *fixation*).
- Now includes coverage of the *representativeness heuristic*.
- New examples demonstrate how the *availability heuristic* distorts judgment, with new photo.
- Thinking Critically About: The Fear Factor infographic updated with current data.
- New photo example of Syrian child after air strike demonstrates the power of cognitive availability.
- New research on the effect of *overconfidence* on medical diagnoses.
- Includes new research supporting the phenomenon of *belief perseverance*.
- New research demonstrates the persuasive power of framing.
- *Nudge* is a new key term.
- New research on fueling creativity.
- Includes new research on cognitive skills in other animals.

### Language

- Language Acquisition and Development discussion improved and updated with new research, including on language diversity and the critical period in children's language learning.
- New research on how the brain processes

language and on the brain areas that process second languages.

- New research on animal communications.

### Intelligence

- New research on the powerful combination of ability, self-discipline, and an environment conducive to developing talent.
- Includes new research on *emotional intelligence* and life success, and school-based programs to improve teachers' and students' emotional intelligence.
- New research on the relationship between aptitude and achievement.
- Updated and improved discussion of the history of intelligence tests.
- Now includes anticipated date for the new version of the WAIS.
- New research supports the reliability of the Stanford-Binet, the WAIS, and the WISC intelligence tests.
- Includes new research on the predictive power of aptitude tests.
- New research indicates that mild intellectual disability is influenced by both genetic and environmental factors.
- New photo example of integrated classroom for children with differing intellectual abilities.
- New cartoon illustrates the high intelligence extreme.
- Includes new research on the finding that intelligence is polygenetic, and on the hunt for intelligence-predicting genes.
- New research support for enduring genetic influences on intelligence.
- New research on how low income and stress can impede cognitive performance.
- New, separate section on growth mindset, with new research throughout.
- New research on intelligence self-assessment among men and women, and on the sharp decline since the 1970s in the boy-to-girl ratio for very high SAT math scores.

- New cartoon illustrates aging and intelligence.
- Discussion of intelligence variation among different gender, racial, ethnic, and socioeconomic groups updated with new research and photos.
- New photo examples of spelling champs, female winner of Fields Medal in mathematics, and World Scrabble champs.
- Improved figure illustrating a spatial abilities test.
- New research on bias, culture-fair aptitude tests, and *stereotype threat*; includes benefits of confidence-boosting exercises.

## CHAPTER 9: MOTIVATION AND EMOTION

### Motivational Concepts

- New research on how incentives increase dopamine levels, strengthening the underlying drive.
- New arousal theory research on curiosity.
- Includes new research on moderate anxiety leading to higher math achievement, and on the effects of overstimulation.
- New research on factors influencing our sense of life's meaning, and on how it predicts well-being and the ability to delay gratification.

### Hunger

- Influence of hunger demonstrated with new research on overbidding and underbidding for snacks to eat at a future time.
- New research on adaptive advantage of pregnant women avoiding potentially harmful foods and other substances.
- Updated figure illustrates the appetite hormones.
- *Obesity* is a new key term; new infographic—Thinking Critically About: The Challenges of Obesity and Weight Control.
- New research on weight management.

### The Need to Belong

- New research on how a sense of belonging creates connection and cooperation, boosting health and well-being; *need to belong* is now a key term.
- New *self-determination theory* research on satisfying our needs for competence, autonomy, and relatedness.
- Updated and new research on the relationship between marriage and both happiness and life span.
- New research on *ostracism*'s vicious cycle, with new school shooting example.
- New research on the health effects of social isolation; now includes WHO finding that social connection is a “determinant of health.”
- Connecting and Social Networking discussion fully updated with American and global data.
- New research explores trends in online dating and its effectiveness; new photos illustrate social media culture.

### Achievement Motivation

- New chapter section—expanded and updated from material previously appearing in Psychology at Work appendix.
- New example of how motives may differ cross-culturally.
- New research supports greater success in people with high achievement motivation.
- New discussion of *grit* as a psychological concept, with new research on how grit focuses and refines talent.
- How Can We Motivate Personal Success? section covers *intrinsic* and *extrinsic motivation* (previously in Learning chapter) and offers list of research-based strategies for achieving goals.

### Emotion: Arousal, Behavior, and Cognition

- Improved organization and addition of navigation cues in emotion theories discussion; helps students better identify distinguishing features of emotions.
- New research on cognitive influences on our

emotional states.

- New neuroscience research on the brain activity underlying emotions and emotion-fed actions, including conscious fear experiences as we become aware that our brain has detected danger.
- Revised art more clearly illustrates the brain's emotional pathways.
- Benefits of conscious reappraisal supported with new research.

### **Embodied Emotion**

- New research on the difficulty in spotting basic emotions.
- New guppy research on emotion detection via eye color changes.
- New neuroscience findings on distinct brain circuits for some emotions.
- Thinking Critically About: Lie Detection has been updated with new research, including on effectiveness of Concealed Information Test.

### **Expressed and Experienced Emotion**

- Detecting Emotion in Others section updated with new research, including on how genuine smiles cause others to perceive us positively and on how we excel at detecting nonverbal threats.
- New research on the difficulty of detecting lies, even in children.
- Gender differences and similarities in emotion perception and expression supported with new research and examples.
- New research on universal ability to discriminate real from fake laughter.
- New research on cross-cultural emotional expression and detection, with a new photo illustrating universal emotions.
- New research and figure illustrate cultural preferences in facial expressiveness.
- Includes new research indicating that paralysis of laughter muscles increases depression, (opposite effect of reduced depression following therapeutic paralysis of

frowning muscles).

- New research on the *facial feedback effect* and behavior feedback effect.

## **CHAPTER 10: STRESS, HEALTH, AND HUMAN FLOURISHING**

- Chapter introduction includes new research on the prevalence of stress in Americans' daily lives.

### **Stress: Some Basic Concepts**

- New Perceived Stress Scale figure allows readers to assess their own stress levels.
- New research on the risks of extreme or prolonged stress.
- New research on the health problems that may result from catastrophes and daily hassles.
- New photo example of Hurricane Michael's aftermath in Florida, with personal author experience.
- New research on the ways in which poverty, inequality, prejudice, and discrimination impact physical and mental well-being.
- Improved explanation of the fight-or-flight response and the role of the sympathetic nervous system.
- New photos, figure, and research examples illustrate *general adaptation syndrome* and stress effects on prisoners of war, refugees, and Syria's White Helmets.
- New research on gender differences in stress response, with new photo example of Olympic marathoners Kara Goucher and Shalane Flanagan.

### **Stress Effects and Health**

- Improved figure illustrating immune responses.
- New research on how stress may speed the course of disease in HIV-infected people.
- Includes new research on the effect of depression on aging and mortality.
- New research suggests treating depression improves cancer patients' quality of life, but

not survival rates.

- Updated data on coronary heart disease rates, and new research on psychological trauma and future heart health.
- New research on the connection between suppressing negative emotions and heart disease risk in Western cultures.
- New photo and research on grief-related depression and mortality.

### **Coping With Stress**

- *Personal control* is now a key term.
- New research on the correlation between external locus of control and posttraumatic stress disorder.
- New photo example of immigrants at the U.S. border powerfully illustrates perceived lack of control.
- New research on the positive effects of believing we control our own lives.
- New research on the importance of building *self-control* to be healthier, happier, and more successful.
- Includes new research on optimism and longevity.
- New research on the dangers of excessive or unrealistic optimism.
- New research on the impact of social support on stress and longevity.
- New cartoon illustrates positive health effects of pets.

### **Managing Stress Effects**

- New research illustrates effectiveness of exercise for managing stress, reducing risk of disease, relieving depression and anxiety, and improving well-being.
- Updated discussion and new research on the psychological benefits of meditation, including *mindfulness meditation*, with new cartoon.
- New research on the faith factor and longevity.

### **Happiness**

- New research on the traits of happy people.
- Material on wealth and happiness improved and organized into new section, “Can Money Buy Happiness?”, with many new research examples throughout.
- Updated figure on the relationship between money and happiness.
- New research on the heritability of happiness.
- Evidence-Based Suggestions for a Happier Life is now a table updated with new research and expanded.

## **CHAPTER 11: SOCIAL PSYCHOLOGY**

### **Social Thinking and Social Influence**

- Updated cross-cultural research on how people in collectivist cultures tend to be more sensitive to the power of the situation.
- New photo example for personal versus situational attributions.
- New international data on attributing personal responsibility for poverty and unemployment among political conservatives.
- New coverage of the *foot-in-the-door phenomenon*'s related door-in-the-face effect.
- New photo example of the power of role playing.
- Zimbardo's prison simulation discussion updated with recent critiques.
- New Persuasion section expands and updates previous coverage; new research examples illustrate peripheral and central route persuasion.
- New infographic—Thinking Critically About: How to Be Persuasive.

### **Social Influence**

- Discussion of social contagion updated with new research.

- New research on the effect of forced violence on obedience.
- New photo example of yesterday's nonconformity becoming today's conformity, and new research on *normative social influence*.
- Milgram obedience discussion includes recent replications.
- New court testimony photo demonstrates the power of the committed individual.
- New *social loafing* research on people's overestimation of their own contributions.
- New photo demonstrates *deindividuation*, with new research on how it thrives in online anonymity.
- *Group polarization* illustrated with new research and examples related to political partisanship and division.
- Improved infographic—Thinking Critically About: The Internet as Social Amplifier.

### Social Relations

- Prejudice section expanded with much new research and new examples; improved organization, with new Targets of Prejudice subsections on Racial and Ethnic Prejudice, Gender Prejudice, LGBTQ Prejudice, and Belief Systems Prejudice. New data throughout.
- New research on benefits of ethnically diverse scientific teams.
- New research on *ingroup bias* presenting as ingroup favoritism.
- *Scapegoat theory* illustrated by the 2016 U.S. presidential election, with data on rise in hate crimes.
- New genetic and neuroscience research on *aggression*; new U.S. data on firearm fatalities.
- New research on how cultures, aversive events, and media may model and reinforce violence.
- Includes new research on pornography consumption and aggression.
- New video game research, including on effects of role-playing aggression.
- Discussion of the *mere exposure effect* includes new research on increasing liking, including even unconscious liking of nonsense syllables.
- Modern Matchmaking section includes new U.S. data on use of online introductions and new research on effectiveness.
- New cross-cultural photo examples of common conceptions of attractiveness.
- New research on similarity in attraction.
- New altruism photo example, and new research on the norms for helping, with Europe's refugee crisis used as an example for the *social responsibility norm*.
- International trends of increasing nationalism and nativism used as new examples of conflict.
- *Mirror-image perceptions* explained with research example of political parties.
- New research on how negative contact increases animosity and on benefits of positive contact for diverse groups.
- Discussion of Sherif's cooperation studies updated with recent critiques.
- New photo example of strangers coming together with a shared goal.
- New photo of mediators helping polarized Americans find common ground.

### CHAPTER 12: PERSONALITY

- Includes updates to the Lady Gaga opening story.

#### Psychodynamic Theories

- Improved discussion of Freud's development of psychoanalytic theory.
- Updated discussion of modern research on the unconscious, with a humorous new personal author example.
- New data on misperceptions about the idea of *repression*.

- New neuroscience research on the mechanisms of projection.

### Humanistic Theories

- Updated example illustrates how the humanistic perspective may reveal theorists' personal values.
- New Carl Rogers image and quote.

### Trait Theories

- Thinking Critically About: The Stigma of Introversion infographic improved and updated with new research and new images.
- New research on personality differences and personality stability among humans and other animals, with new cartoon and photo.
- New research on use of the *MMPI* to identify those feigning a psychological disorder.
- Discussion of the Big Five factors includes much new research, including on clinical applications, stability, brain structure, universality, and predictive ability.
- Big Five table has been updated, with helpful *OCEAN* acronym.
- New photo examples illustrate how researchers use Facebook likes to predict Big Five traits, opinions, and political attitudes.
- New research on how major life events and new situations can shift the personality traits we express.
- Improved discussion of the person-situation controversy.
- New research on the worldwide tendency to express similar traits in varied situations.
- Includes new research on predicting traits from written communication, online expression, and personal spaces.

### Social-Cognitive Theories

- Reciprocal Influences section updated with new research on how people choose their

environments and on how our personalities help create situations to which we react.

### Exploring the Self

- New research on how self-esteem increases from adolescence to middle adulthood.
- Includes new research on the traits of *narcissistic* individuals, and on how narcissism can prompt aggression.
- New *self-serving bias* research, including its relationship to emotional well-being and the brain activity underlying these judgments.
- New research on Americans' assessment of their own intelligence and tendency to see their own groups as superior.
- New individualist and collectivist research, with new material on intracultural variations and a new cartoon.

## CHAPTER 13: PSYCHOLOGICAL DISORDERS

### What Is a Psychological Disorder?

- New global data on mental and substance use disorders, and new international survey research on first-year university students.
- New photo example illustrates differing cultural perceptions of normality.
- New research on increased risk of psychological disorder among distressed transgender or gender nonconforming children and adolescents.
- New data on prevalence of attention-deficit/hyperactivity disorder, and new research in the infographic—Thinking Critically About: ADHD—Normal High Energy or Disordered Behavior?
- Discussion of the biopsychosocial approach now notes the vulnerability-stress model and its support from epigenetic research.
- New research updates DSM-5 discussion, and notes its similarity in diagnostic criteria and codes to the WHO's International Classification of Diseases (ICD).

- New coverage of the Research Domain Criteria (RDoC) project.
- New research on how people with psychological disorders face stigma—a barrier to treatment.

### **Anxiety Disorders, OCD, and PTSD**

- New research on how some people are more prone to an overactive danger-detection system, and new research example illustrates implications of social anxiety disorder.
- New photo examples illustrate panic attacks and *obsessive-compulsive disorder*.
- Hoarding disorder and other OCD-related disorders are now noted.
- Discussion of *posttraumatic stress disorder* updated with new research and examples, with new photo of Parkland PTSD-affected survivors; new research on posttraumatic growth.
- New fearlessness-of-heights photo; discussion of biological factors includes new research on genetic and epigenetic influences, with anxiety-related disorders expressing themselves biologically as overarousal.
- New research on search for specific brain cells that contribute to anxiety, to help people control it.

### **Substance Use Disorders**

- Now includes the DSM-5 substance/medication-induced disorders categories.
- New infographic—Thinking Critically About: Tolerance and Addiction.
- Updated discussion of *alcohol use disorder* and alcohol's effects on neural functions, with new data and research.
- New *opiate* research and expanded discussion of artificial opiates and the overdose crisis; new data and photos.
- New report on minimal academic benefit of stimulants for students.
- Updated information on e-cigarettes, including the boom in vaping among youth.

- Revised figure on the physiological effects of nicotine now shows vaping teen, and new photo shows media models that influence teens.
- U.S. and global statistics on smokers' reduced life expectancy.
- Powerfully rewarding effect of *cocaine* supported by new research.
- New neurological research on *LSD*.
- New research on *marijuana*'s use in alleviating pain and nausea; its association with risks such as chronic bronchitis and academic underachievement; and its likely effects on attention, learning, and memory.
- Updated table on psychoactive drugs.
- Updated data on trends in substance abuse, including in figure on high school trends.
- Updates on the biopsychosocial influences on substance use, with new cross-cultural and other research examples.

### **Major Depressive Disorder and Bipolar Disorder**

- New research on the protective sense of suffering, including benefits of improved critical thinking, attention to detail, and decision making.
- New art illustrates research on the gut-mood relationship.
- Updated global data on depression's prevalence; new survey research on U.S. adults; new research on the seasonal pattern debate.
- New research on bipolar disorder's correlation to creativity; new photo example.
- New research on disruptive mood dysregulation disorder.
- Fully updated Understanding Major Depressive Disorder and Bipolar Disorder discussion, with updated global rates, demographics, and risk of recurrence.
- New research on childhood abuse and risk of adult depression, and on combatting depression by replacing stressors with

meaningful relationships and activities.

- New figure illustrates worldwide female-to-male depression ratio.
- Culprit gene variations that increase depression risk discussed with new research.
- New research on how diet and exercise may ease depression symptoms.
- New research on heritability of major depressive disorder.
- New social-cognitive research on and examples of rumination and self-blaming.
- Now notes Olympic athletes who have struggled with depression.

### Schizophrenia

- New global data on schizophrenia rates.
- New research on impaired ability to feel sympathy and compassion in those with schizophrenia.
- New research on schizophrenia brain abnormalities.
- New global research investigating genome locations, and new research on the influence of many genes, each with very small effects.

### Other Disorders

- New eating disorder research on anorexia nervosa often beginning as an attempt to lose weight, and on teen boys' pursuit of extremely large muscles.
- New U.S. data on eating disorder prevalence.
- New research on increased risk for shortened life, suicide, and nonsuicidal self-injury among those with eating disorders.
- New research on recovery from eating disorders, and on the success of preventive interactive programs.
- New photo example from a recent film depiction of dissociative identity disorder.
- Now differentiates DSM-5's three clusters formed from the ten personality disorders.
- New example of serial killer exhibiting extreme lack of remorse; new antisocial

personality disorder research on early detection, criminality, impulsivity, and arousal.

- New examples of fearlessness and heroic acts *not* leading to criminal behavior.
- Includes new research on genetic and environmental influences on antisocial personality disorder, including new chimpanzee research.

### Risk of Harm to Self and Others

- New Risk of Harm to Self and Others section, within which Understanding Suicide, Nonsuicidal Self-Injury, and Does Disorder Equal Danger? now appear in updated form.
- Discussion of suicide fully updated with new data and research, including on why suicidal urges typically arise, and on social media's possible influence on the rise of teen suicide.
- Includes new research on self-harm.
- New research supports the point that most mentally ill people are not violent.
- New example of concussion-related brain damage leading to danger to others.

## CHAPTER 14: THERAPY

- Chapter introduction updated with new examples of Kerry Washington's and Katy Perry's experiences with therapy, and the Duchess of Cambridge's mental health advocacy.

### Treating Psychological Disorders

- New data on the proportion of Americans receiving some form of outpatient mental health therapy.

### The Psychological Therapies

- New research on the use of *exposure therapies* in people with PTSD.
- Improved explanation of *systematic*

*desensitization.*

- New research on and improved explanation of *virtual reality exposure therapy*.
- Real-life example of Aaron Beck's patient illustrates the development of his therapeutic approach.
- New research on the benefits of positive self-talk for people with anxiety.
- Discussion of CBT updated with new research examples, including CBT's effectiveness in treating ADHD, the benefits of online or app-guided CBT, and the use of dialectical behavior therapy.

### **Evaluating Psychotherapies**

- Discussion of psychotherapy's effectiveness improved and updated with new research.
- New research on which psychotherapies show the most and least promise for particular problems, with new research on the potential harmfulness of some therapies without scientific support (such as "conversion therapies" for those with same-sex attractions).
- Improved How Do Psychotherapies Help People? discussion, with new cartoon.
- New research on the personal factors that influence the therapist-client relationship, including therapists' attitudes toward LGBTQ individuals.
- Improved advice on finding a psychotherapist, including through the use of mental health apps.

### **The Biomedical Therapies**

- Updated discussion of the interaction between psychological and biological influences, and of how lifestyle affects mental health.
- New research indicates that some psychologists consider even psychotherapy to be a biological treatment because of its brain-changing ability.
- Thinking Critically About: Therapeutic

Lifestyle Change infographic updated with new research.

- New research on computer programs' ability to identify which people with schizophrenia will benefit from specific antipsychotic medications.
- New research on quicker-acting antidepressants for those at risk of suicide.
- Includes new research on the benefits of regular physical activity for teen mental health, and on how exercise predicts a lower depression risk for adults worldwide.
- New research supports aerobic exercise and cognitive-behavioral therapy as effective and side-effect-free alternatives to drug treatment of mild to moderate depression.
- Discussion of ECT includes new research on relapse risk and new neuroscience research on how the procedure may combat severe depression.
- Alternative Neurostimulation Therapies section now discusses tDCS and includes new research on the effectiveness of TMS, with new figure comparing several neurostimulation therapies.
- New research discusses the potential benefits of deep brain stimulation, with new image of researcher Helen Mayberg.
- New research on MRI-guided precision psychosurgery.

### **Preventing Psychological Disorders and Building Resilience**

- Includes new John McCain photo examples of resilience, and new research on positive psychology interventions.
- Includes new research on the various responses people may have to extreme suffering or trauma, from lasting harm to personal growth.

## APPENDIX A: STATISTICAL REASONING IN EVERYDAY LIFE

### Describing Data

- New examples demonstrate our love for big, round numbers and the dangers of statistical illiteracy.
- New example of how a skewed distribution can influence the mean, with improved visual.
- *Variable* is a new key term.
- New example of a perfectly negative correlation.
- New emphasis on *illusory correlations* (with new key term) in relation to *regression toward the mean*, with new employee-manager example.

### Significant Differences

- New research indicates that psychological studies often fail to replicate if there are not enough cases to yield reliable results.
- Discussion of observed differences now includes information on *p*-values and statistical significance.

## APPENDIX B: PSYCHOLOGY AT WORK

- Improved and updated introduction.
- Improved organization of the entire appendix; increased coverage with new research throughout of *flow* and of matching interests to work.

### Work and Life Satisfaction

- New research on the importance of meaningful work.

### Industrial-Organizational Psychology

- New research on work's expansion (such as to off-site and outsourced workplaces).

### Organizational Psychology

- Includes new research on how satisfaction with work and one's work-life balance (which may include telecommuting)

supports better health.

- New research updates financial benefits for companies people desire to work for.
- New photo examples of meaningful work that has task significance.
- New research on charisma updates discussion of *leadership* and leadership styles.
- New research suggests that those practicing social virtues achieve more leadership success.
- New Cultural Influences on Leadership section, which includes discussion of Project GLOBE studies of cultural variations in leadership expectations.
- New photo example illustrates effective leadership.
- Includes new global research on value of strengths-based leadership that identifies and enhances employee strengths.

## APPENDIX C: CAREER FIELDS IN PSYCHOLOGY

- This appendix focuses on educational requirements, type of work, and likely places to work for each of psychology's main career fields. Our more comprehensive, regularly updated online resource is also available in LaunchPad: Pursuing a Psychology Career.

## APPENDIX D: COMPLETE CHAPTER REVIEWS

- To encourage students to self-test, the Reviews at the end of each chapter include only a list of the learning objective questions—repeated from within that chapter. Students may check their answers here.

## APPENDIX E: ANSWERS TO RETRIEVE & REMEMBER AND CHAPTER TEST QUESTIONS

- Students may check their answers here for

the interspersed, multiple-format Retrieve & Remember questions and for the Chapter Test self-test questions that conclude each chapter.

**NEW APPENDIX F: THE STORY OF  
PSYCHOLOGY—A TIMELINE**

- New illustrated timeline of key events in psychology's history, including the many diverse contributions.